



# **National Oceanic and Atmospheric Administration**

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## RAINFALL FOR JANUARY, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each Division. These results are reproduced in the Comparative Table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four Divisions.

The Northern Division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central Sub-Division; the Southern Division comprises the southern shores from Holland Bay to South Negril; the North Eastern and west Central Divisions are the remaining parts of the Island bounded by the sea and the other Divisions. Their relative areas are as follows:—

North Eastern Division	—	25
Northern and Central	—	22
West Central	—	26
Southern	—	27
		100

NORTH-EASTERN DIVISION.	JANUARY, 1908.				
	Total Fall.	Greatest fall in 24 hours		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Manchioneal	11.60	3.62	25	20	4.05
Spring Valley	13.51	2.74	25	14	...
Bath	9.74	1.90	25	20	5.39
Boston	8.96	3.95	14	7	9.45
Moore Town	19.09	5.60	31	4	...
Port Antonio	9.16	1.50	25	21	8.26
Fellowship	18.85	3.80	14	24	...
Johnson River Bridge	5.66	2.08	11	15	...
Shrewsbury	31.45	6.96	26	26	...
Cedar Valley, St. Thos	5.66	1.77	11	12	3.18
Hill Gardens	8.88	1.09	4	19	7.34
Buff Bay	14.91	4.08	25	14	9.25
Vinery	25.32	5.61	15	21	...
Greenvale, Portland	31.32	6.70	26	24	...
Mt. Holstein	16.76	2.24	22	23	...
Hardware Gap	...	...	...	...	...
Irish Town	...	...	...	...	...
Stony Hill Reform.	4.84	0.70	10	20	3.45
Castleon Gardens	12.57	2.45	4	17	8.32
Lawrence Tavern	...	...	...	...	...
Water Valley	7.00	1.45	15	18	...
Agualta Vale	7.73	1.50	9	18	...
Hampstead, St. Mary	6.18	1.25	14	18	...
Albany Ry. Station	4.67	0.91	15	11	...
Richmond, St. Mary	5.77	1.25	14	15	5.20
Kendal, St. Mary	8.19	2.04	1	12	...
Gayle, P. W. D	5.04	0.91	2	17	7.72
Rio Hoe	6.60	1.50	3	17	5.38
Unity Valley	6.11	1.07	23	21	4.66
Moneague	4.10	0.70	23	21	3.59
Union Hill	...	...	...	...	...
Claremont	4.21	1.11	4	6	5.96
Albion, St. Ann	4.46	1.08	3	15	5.01
Averham Park	5.65	1.29	3	15	6.07
Ballintoy	...	...	...	...	...
Means	7.53	...	...	...	6.01

## JANUARY, 1908.

## NORTHERN DIVISION.

	Total Fall.	Greatest fall in 24 hours		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	5.73	1.45	14	12	6.26
Ocho Rios	5.10	1.30	15	11	...
Bogue, Ocho Rios	6.42	1.95	15	10	...
Drax Hall	7.96	2.00	14	11	3.94
Liberty Hill	6.32	1.50	15	9	...
St. Ann's Bay	7.15	2.73	14	15	4.24
Seville	10.36	4.24	15	15	6.34
Richmond Estate	...	...	...	...	...
Llandoverly	10.78	3.51	14	10	6.13
Southfield, St. Ann	7.30	2.74	14	15	...
Brown's Town	6.76	1.75	15	12	3.78
Hyde Park	1.38	0.40	16	7	...
Ivy Harbour	4.20	2.00	8	5	...
Chewmagna, St. Ann	2.10	0.58	21	9	...
Home Castle	6.20	2.50	15	8	4.89
Richmond Pen	3.29	1.05	9	6	3.29
Mahogany Hall	...	...	...	...	...
Brampton Bryan	3.61	1.30	15	8	3.88
Bryan Castle	5.76	1.45	14	11	4.26
Braco	5.05	1.20	15	9	4.06
Arcadia	4.99	1.75	14	10	4.16
Harmony Hall	4.89	1.20	14	12	3.85
Vale Royal	4.66	1.48	15	10	4.64
Colchis Pen	5.28	2.00	14	4	2.39
Swanswick	4.05	1.50	14	8	...
Hyde	...	...	...	...	...
Georgia	3.71	1.10	15	9	3.78
Long Pond	3.81	1.15	15	8	...
Hyde Hall	3.79	1.00	15	7	...
Steelfield	3.95	1.00	15	8	4.34
Etingdon	3.13	1.25	14	8	...
Oxford	4.70	1.48	14	10	3.81
Cambridge	4.85	1.60	15	8	4.40
Lottery	4.89	1.10	14	8	3.67
Falmouth P.W.D.	4.20	1.11	15	12	3.61
Florence Hall	4.13	1.05	14	10	...
Holland Pen	4.99	1.30	15	8	2.64
Kent	5.15	1.80	16	11	3.81
Canaan	3.01	1.52	15	9	...
Lima	4.01	1.35	15	7	...
Content	5.33	2.30	8	7	4.36
Belfield	3.94	1.08	14	7	...
Moor Park	5.54	2.10	8	10	...
Success	4.80	1.70	15	10	...
Cinnamon Hill	4.73	1.65	15	10	...
Rose Hall	3.45	1.60	15	10	...
Running Gut	3.89	1.75	15	10	...
Montego Bay	3.36	1.46	14	6	2.22
Fairfield, St. James	3.14	1.00	15	6	...
Round Hill	3.50	...	...	...	...
Sandy Bay	4.96	3.20	9	6	2.35
Lucea	1.54	0.74	9	7	1.99
Westfield	2.04	0.85	8	5	...

CENTRAL SUB-DIVISION.	JANUARY, 1908.					SOUTHERN DIVISION.	JANUARY, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.		In.	In.			In.
Headworks, Rio Cobre	4.35	0.97	12	15	1.84	Morant Point L. H.	4.18	1.37	16	22	3.85
Shanton	5.18	1.30	13	11	...	East Prospect	3.61	1.11	15	13	...
Linstead	3.80	1.00	14	11	...	Morant Bay	4.95	1.55	11	15	2.42
Berkshire Hall	2.88	0.70	2	23	...	Easington	3.41	1.16	11	9	1.26
Point Hill	4.60	1.57	14	6	...	Bull Bay	...	...	...	...	...
Carew Castle	5.14	1.61	13	13	...	Gordon Town	...	...	...	...	...
Worthy Park	3.93	0.66	4	12	2.08	Hope Gardens	3.57	0.98	10	16	1.67
Chapelton	2.67	0.85	5	13	2.31	King's House Garden	3.03	1.10	11	14	1.22
Mears	0.94	0.52	22	3	...	Half-way Tree	...	...	...	...	...
Danks Works	1.94	0.50	4	17	...	Lunatic Asylum	0.98	0.49	11	8	...
Savoy House	2.60	0.53	4	14	...	Kingston S. Camp Rd.	1.05	0.57	11	7	...
Crofts Hill	2.70	0.56	23	13	...	" P. W. Office	0.92	0.37	10	8	1.10
Cave Valley	1.26	0.25	5	8	2.32	Plumb Point L. H.	0.87	0.32	11	13	0.81
Means	5.03	...	...	...	3.70	Ballast Ground	...	...	...	...	...
WEST CENTRAL DIVISION.						Spanish Town	2.12	0.79	12	5	...
Baillieston	4.65	1.40	28	11	...	Hog Hole Pen	4.46	1.71	12	10	...
Farm Plantation	2.31	0.75	14	7	2.80	Browns Hall	3.17	0.74	12	14	...
Brokenhurst	4.38	0.76	27	13	3.45	Old Harbour	4.62	1.28	27	10	...
Christiana	1.95	0.50	16	9	2.11	May Pen	1.89	0.50	13	7	1.10
Chudleigh	4.61	1.48	20	8	...	Hillside Estate	2.73	1.02	15	6	...
Shooter's Hill	3.37	1.50	28	13	...	Amity Hall	...	...	...	...	...
Spitzbergen	3.02	0.89	19	15	...	Money Musk	...	...	...	...	...
Kendal, Manchester	3.89	1.40	28	8	2.58	Dunkley's, Vere	3.30	1.73	27	9	...
Marshalls Pen	3.87	1.70	20	9	3.01	Denbigh	2.10	0.90	13	4	1.60
Mandeville, P.W.D.	3.96	1.08	20	17	3.14	New Yarmouth	3.66	1.52	27	5	...
Carlton, Mandeville	3.21	0.80	20	4	...	Exeter, Vere	2.30	0.83	13	7	...
Fairfield, Manchester	3.06	0.90	19	12	...	Rhymesbury	1.38	0.38	1	8	...
Ulster Spring	4.19	1.05	9	11	2.43	Springfield, Clarendon	3.68	1.52	27	5	...
Albert Town	4.20	1.00	12	8	...	Milk River	2.76	1.00	20	8	...
Low River	3.62	1.10	12	11	...	Clarendon Pk. Ry. St.	2.35	1.00	27	7	...
Troy	4.76	1.79	13	10	...	Victoria Town	3.45	1.13	13	10	1.51
Fontabelle, Trel.	4.65	1.40	12	10	2.53	Stone's Hope	2.71	1.12	27	14	2.68
Windsor Pen, Trel.	4.01	0.87	9	9	2.59	Newport, Manchester	4.15	0.96	27	13	2.10
Wallingford	...	...	...	...	...	Great Valley, Man.	1.88	1.05	27	8	...
Balaclava	1.85	0.89	20	3	1.34	Alligator Pond	0.66	0.61	27	2	0.92
Siloah	4.75	1.50	9	7	...	Pepper	2.90	1.55	19	6	1.77
Appleton Estate	3.76	1.28	9	9	2.29	Long Hill	...	...	...	...	...
Maggotty	...	...	...	...	...	Torrington	4.91	1.35	27	13	...
Catadupa Rly. Station	1.45	0.32	1	8	...	Bethlehem, St. Eliz.	2.85	0.65	28	13	...
Kempshot	3.91	1.50	15	11	3.52	Santa Cruz	3.39	1.46	20	8	3.08
Kew Park	1.94	0.48	23	11	1.92	Pedro Plains	2.83	0.80	1	6	...
Hazelymph	1.59	0.52	23	7	...	Black River	1.60	0.55	18	12	1.54
King Gate	4.34	1.07	15	8	...	Spring Hill	...	...	...	...	...
Darliston	2.86	0.90	19	9	2.50	Font Hill	1.35	0.75	21	4	1.84
Whithorn	1.39	0.45	17	9	1.58	Peters Ville	3.23	1.09	9	8	1.82
Great Valley	5.40	2.30	8	5	3.74	Mount Edgecombe	1.93	0.70	19	9	2.03
Brownsville	6.59	3.80	8	7	...	Bluefields	2.60	0.80	19	5	...
Fontabelle, Westm.	0.42	0.26	12	4	2.14	Sweet River	1.56	0.60	18	4	1.93
Morgan's Bridge	0.75	0.25	12	7	1.70	Windsor, Sav.-la-Mar	1.04	0.32	1	8	1.82
King's Valley	1.24	0.50	12	6	2.51	Sav.-la-Mar P.W.D.	0.90	0.25	16	9	1.43
Glasgow Estate	...	...	...	...	...	Retreat	1.71	0.80	1	6	1.60
King's Vale Police St.	3.19	1.77	8	8	...	White Hall	0.52	0.46	1	2	...
						Negril Point L. H.	0.94	0.35	1	6	...
Means	2.98	...	...	...	2.52	Means	1.98	...	...	...	1.75

NOTES.  
COMPARATIVE TABLE OF RAINFALL.

(Based upon the "Average" Stations only.)

	JANUARY.	
	1908.	Average.
	In.	In.
North Eastern Division	7.53	6.01
Northern	5.03	3.70
West Central	2.98	2.52
Southern	1.98	1.75
Means	4.38	3.49

The Rainfall over the Island for January, 1908, was therefore well above the average, as was pointed out in the newspapers previous to this report.

The maximum rainfall recorded was at Shrewsbury in the north eastern division, 31.45 in., the minimum rainfall recorded was at Fontabelle, Westmoreland, in the west central division, 0.42 in.

At George Town, Grand Cayman, the total rainfall for December, 1907, was 2.82 in.; 1.37 in. fell on December, 25th and on seven days rain fell.

For January, 1908, the total rainfall was 1.19 in. 0.41 in. fell on January 12th, and on six days rain fell.

SHOCKS OF EARTHQUAKE IN JANUARY, 1908.

Date	Mean time.	Intensity.	Notes: where felt, etc.
Jan.	Hr. M		
2	8 9 a.m.	IV	Whole Island
"	1 p.m.	I	Brownsville
"	During night	I	Cinnamon Hill, two shocks
3	5 59 p.m.	II	Montego Bay do Chapelton, N 25 E 0.010 Cinnamon Hill, Montego Bay Kempshot Negril Pt. L. H. Cinnamon Hill
"	9 30 "	I	Kempshot
4	11 25 a.m.	I	Black River
6	10 45 p.m.	II	do Sav.-la-Mar
8	2 10 a.m.	I	do
"	11 3 "	II	Chapelton
10	1 25 p.m.	I	do
12	3 40 "	I	Fontabelle, Westm.
13	11 30 "	I	Kings Valley: sound from N
15	10 p.m.	"	lasting 30 or 40 min. as if enormous seas were rolling up a beach
17	8 a.m.	I	Mt. Holstein
"	6 p.m.	II	Fontabelle, Westm.
19	9 "	I	Chapelton. N 60 E 0.702
21	8 28 a.m.	I	Negril Pt. L. H. N. 10 E, 0.020
"	11 p.m.	I	Mt. Holstein; long rumble with shock
22	10 39 "	I	Kingston, N 10 E, 0.002
28	3 55 a.m.	I	do N 112 E, 0.003
30	6 10 p.m.	"	King's Valley booming sounds from the N E & E respectively
31	8 "	"	

THE EARTHQUAKE OF JANUARY 2ND, 1908.

The concluding remarks in the *Report on the Great Earthquake of Jan. 14th 1907* expressed a desire to know whether or not the ordinary shocks which would succeed the series of after-shocks would come from the same subsidences and faults at the east end of the Island: and it is remarkable that the series seems quite closed as far as Chapelton is concerned; the first want of agreement between the seismometers at Kingston and Chapelton on the 22nd Aug. was referred to in the *Weather Report* for that month; it was then surmised that both the shocks were local; and subsequently small local shocks were felt all over the Island, which still continue.

In this new series a rather severe shock occurred on Jan. 2nd, 1908; and as some of its features confirm results arrived at in the *Report*, it is here proposed to carefully examine the information kindly sent me from various parts of the Island, but chiefly from the west.

CINNAMON HILL, ST. JAMES. Mr. Jos. Shore.

"I was in the office attached to the house here when the shock occurred, and heard a heavy rumbling sound apparently coming from the N W, followed by a shock of about 5 sec. duration. Afterwards 2 or 3 sec. of less movement: then a much heavier shock lasting about 10 sec., which rocked the house very much and caused the roof to strain till I thought it would be torn off. This house is very strongly built, with 3 inch walls and roof anchored to the ground by hardwood posts through the walls, and it is not very high from the ground, being also well braced together to resist hurricanes. There did not appear to be so much upheaving as on Jan. 14th 1907, but more lateral motion: and had it lasted a little longer I fear all the houses would have been down.

The direction seemed to be from N W to S E.

Orange Valley house suffered a good deal having the inner walls badly cracked and from Falmouth to Montego Bay many houses had walls cracked and Spanish-walling thrown down."

BLACK RIVER, Mr. E. J. Barry.

The Parish Church, the Wesleyan Chapel, and a few stores and houses were damaged by the shock which lasted 20 sec. "It was from the south-east with a strong southerly tendency. As the High street runs almost due east and west, goods on shelves and windows on the south side of the street were thrown into the street, but those on the north side were thrown inwards."

(1) From these two accounts it would appear that there was about the same intensity at the two places, but that the shock came from opposite directions; so that we feel inclined to place the epicentre somewhere between them: at Ipswich for instance, or any where in the Cockpit country. And from what follows it appears that if an oval be drawn on the map of Jamaica through Ipswich, Accompong, and Siloah, it will fairly represent the epicentre: and that if a curved line be drawn through Runaway Bay, Crofts Hill, and Milk River, it will divide the Island into two parts, the shock being of No. III intensity in the eastern part, and of No. IV intensity in the western part. At the epicentre it was probably between No. IV and V.

APPLETON, Mr. J. M. Farquharson

A severe shock, apparently east to west. Several small houses were damaged in the district of Siloah.

IPSWICH, Mr. C. Maxwell Hall.

In the railway cuttings between the 84th and 88th mile posts, that is to say, between Appleton and Ipswich, rocks had fallen.

MOUNT ENGECOMBE, WESTM. Mr. C. B. Vickers.

"It lasted longer than any earthquake I remember; motion S to N \* \* \* \* \*. My tank lies N and S, and the water was agitated in the direction of its length: the water in a small tank beside it was also much agitated."

NEGRIL Pt. L. H. *Mr. J. S. Brownhill.*

"The shock occurred at 8 hr. 8 min. a.m. and was much more severe than on Jan., 14th, 1907: the direction was N E and S W: there was very little rocking motion: it appeared as if the earth bumped up and down."

BROWNSVILLE, HAN. *Rev. J. F. Gartshore.*

"I was out riding and heard the roar away to the east, just like muffled thunder. I pulled up my horse to listen: she got restive, but I did not feel anything. . . . My wife said that the house shook violently, and that the shock came from the E or E S E."

MONTGO BAY, *Rev. T. D. McNee.*

"The shock took place at 8 hr. 9 min. I was seated in my study when I heard a rumbling noise as if the shingles on the roof of the house were all in a flutter. The noise was more over head; and the tremors seemed to move E and W. The disturbance was not more than from 7 to 10 sec. at most . . . . At Bona Vista some 9 miles south, the impression as to the sensation was somewhat similar. At Saltspring the shock was so violent as to ring the Kirk bell, and the people were much alarmed."

PHOENIX, TREL. *Mrs. H. J. Kerr.*

"There were two shocks from N W to S E which threw things down. It was as severe as the shock on Jan. 14th, 1907."

CHAPELTON. *Mr. Maxwell Hall.*

There were tremors for  $3\frac{1}{2}$  sec., then there was a pause for  $1\frac{1}{2}$  sec., then tremors again for 5 sec., and finally undulations for 5 sec., making altogether 15 sec. There was no doubt about the undulations: they could be seen as well as felt: and the water in a large iron tank was dashed from side to side. The shock was said to have come from the E.

The duplex seismometer separated out three kinds of motion; the first consisted of several trembling vortico-se movements round the vertical; the second was a clear well-marked shock N  $50^\circ$  E, with a horizontal ground movement of 0.077 inch., which corresponds to a scale shock between Nos. III and IV; and the third set consisted of waving lines N  $10^\circ$  E at least 4 inches in length on the plate, such as have never been recorded before as far as I am aware. These long lines were without doubt due to the undulation of the ground which made the two pendulum swing; and the duplex principle produced fairly straight lines.

At the May Pen court house and at Rhymesbury a few miles to the south-west of May Pen, plaster fell from the walls, so that the intensity was between Nos. III and IV as recorded at Chapelton.

LINSTEAD. *Mr. D. Campbell.*

"The movements here, instead of being wavy, were rapidly horizontal; something like the movements of a sieve when being shaken. The shocks came apparently from the south-east, and were three in number: the second was the most violent."

KINGSTON. *Mr. J. F. Brennan.*

"The shock commenced at 8 hr. 9 min. 15 sec. and lasted 20 sec. General direction S E to N W. A few tottering or unstable walls\* fell; and at Camp there were a few small cracks in the walls. There was a gentle vibration for about 3 or 6 sec., then there were three heavy movements succeeding with intervals of a few sec. The weather was fine and clear."

The Kingston dead-beat seismometer gave a wonderfully tangled record; this may have been due to the instrument, or to its attachment to a wall, or to both: the result is that it is difficult to make out the general direction. Mr. Brennan chose S E and N W as shown by the longest diameter of the whole tangled figure. But it will be noticed that there are several fairly straight lines on the right and left hand of the

figure; and these we shall consider to be the representatives of the undulations N  $10^\circ$  E of the Chapelton seismometer, having very much the same direction.

Again, if we hold the print at a considerable distance, it will be seen that the tracings at the centre form a patch nearly half an inch long pointing N E and S W, which may or may not correspond with the N  $50^\circ$  NE of the Chapelton seismometer.

MOUNT HOLSTEIN, District of St. George. *Mr. A. Benn.*

"It commenced with a gentle trembling which gradually increased in intensity and violence, and then gradually subsided. It was not preceded by a rumble, but was instantly followed by a loud and persistent one. The general direction was from S to N as all our shocks are."

"Our shocks are generally preceded by a rumble, and are sudden and sharp, differing in these respects from those of the Jan. 14th 1907 and Jan. 2nd. 1908."

(2) Now if the directions of the shock at the different places be drawn on the map, and if lines be drawn from the epicentre to the places, it will be found that the directions are not at right angles to the lines as was the case in the earthquake of Jan. 14 1907, but that they are at an angle of  $45^\circ$  to the lines; so that if a place were due north of the epicentre, as Cinnamon Hill for instance, the direction would be N W and S E.

Cinnamon Hill, Black River, Appleton, Mount Edgecombe, Negril, Brownsville, Montego Bay, Phoenix, Chapelton N  $50^\circ$  E, and Kingston, from my point of view, all agree with the above rule; but Linstead and Mount Holstein do not; they form exceptions.

(3) Again, in the *Report* it was stated at p. 12 that I found it difficult to understand why shocks N and S for instance, were often described as from S to N or N to S as the case might be; the same thing occurs in the descriptions given above; and at Cinnamon Hill, Black River, Appleton, Mount Edgecombe, and Phoenix, the emphasized motion was from left to right and towards the epicentre. But at Cinnamon Hill the sound and the emphasized motion were both from the same direction, namely N W; and by considering other cases in the two earthquakes I am inclined to think that it is the sound which emphasizes the motion. So that when the motion is said to be from N E to S W, we are to understand that the vibrations were N E, as S W and that the sound came from the N E, as at Annotto Bay, Jan. 14th, 1907.

(4) The next matter for consideration is that the sound at any place seems to come from a direction more or less opposite to the epicentre. Thus in Jan. 14th, 1907, the sound at Blue Mountain Valley was from the N E; at Annotto Bay the same; at Cinnamon Hill from the N; and at Kempshot from N W, and at Kingston the after-shocks that night were from the N W and at Buff Bay on the 15th from the sea, or N. Again on Jan. 2nd 1908, we have the sound at Cinnamon Hill and Kings Valley from the N W, and at Chapelton from the E.

But Brownsville proves an exception to this rule although it confirms the last.

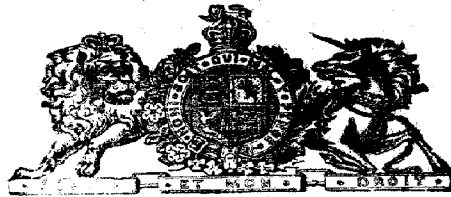
(5) Lastly, the No. VI shock in 1907, set the motion at any place at right angles to the line joining the place and the epicentre; the No. IV shock in 1908, set the motion at any place at an angle of  $45^\circ$  to the line; it was assumed in the *Report* pp. 23, 24, that shocks of No. III intensity and under would be along the line; and nothing has occurred since then to show that the assumption was incorrect.

MAXWELL HALL,  
Government Meteorologist.

Chapelton.

\* Among the ruins due to the earthquake and fire of Jan. 14th, 1907.

No. 350.



JAMAICA

# WEATHER REPORT

FOR THE MONTH OF

FEBRUARY, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations except the Hill Gardens are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. The pressure at the Hill Gardens is reduced to the first three standards only. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus; the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATION.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range.	Max.	Date.	Min.	Date.	Range.
	ft.	in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	30.002	...	77.1	80.8	82.7	73.5	9.2	86	10	66	17	20
Negril Point Light House	33	30.019	29.968	72.6	80.7	83.8	68.9	14.9	89.1	11	63.5	25	35.6
Kingston	50	30.002	29.960	69.9	81.2	86.7	67.9	18.8	89.1	4	64.6	16	24.5
Castleton Gardens	496	...	...	64.0	77.6	81.2	64.8	16.9	85	19	58	24	27
Hope Gardens	668	...	...	64.8	79.8	84.1	57.4	26.7	86	2*	54	20*	32
Stony Hill Reformatory	1,400	...	...	66.4	76.8	80.2	68.0	17.2	83	10*	60	16	23
Hill Gardens	4,907	25.242	25.238	57.6	61.6	66.1	54.6	11.5	69	12*	49	16	20

STATION.	Elevation.	Dew Point and Humidity.				Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
		7 a.m.	3 p.m.					7 a.m.	3 p.m.			7 a.m.	3 p.m.				
	ft.	°	°	°	in.		miles	m.	m.	m.		L.	M.	U.	L.	M.	U.
Morant Pt. Light House	8	...	...	...	...	2.66	...	NE 8.3	ENE 10.3	...	...	1.6	2.1	1.4	1.4	1.7	1.4
Negril Point Light House	33	66.1	80	67.8	65	3.06	268	NE 7.9	NNE 15.4	...	...	1.7	1.5	0.4	3.1	2.0	0.1
Kingston	50	63.7	81	69.2	67	1.29	...	N 4.0	SE 10.5	...	...	1.2	1.5	0.0	3.2	2.4	0.3
Castleton Gardens	496	62.8	96	68.9	73	12.12	...	...	...	...	...	...	...	...	...	...	...
Hope Gardens	668	61.7	90	67.2	62	1.92	...	...	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory	1,400	63.2	89	70.2	80	4.00	...	...	...	...	...	...	...	...	...	...	...
Hill Gardens	4,907	54.7	89	58.4	86	4.69	...	...	...	...	...	...	...	...	...	...	...

\* and on other days.

## RAINFALL FOR FEBRUARY, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each Division. These results are reproduced in the Comparative Table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four Divisions.

The Northern Division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central Sub-Division; the Southern Division comprises the southern shores from Holland Bay to South Negril; the North Eastern and west Central Divisions are the remaining parts of the Island bounded by the sea and the other Divisions. There relative areas are as follows:—

North Eastern Division	—	—	25
Northern and Central	—	—	22
West Central	—	—	26
Southern	—	—	27

100

## FEBRUARY, 1908.

NORTH-EASTERN DIVISION.	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Manchioneal	4.75	1.24	14	14	6.49
Spring Valley	7.19	1.60	5	15	...
Bath	5.06	0.86	5	17	5.17
Boston	5.61	2.10	22	5	4.76
Moore Town	18.00	...	...	...	...
Port Antonio	7.08	2.11	23	19	5.47
Fellowship	11.02	1.75	5	20	10.11
Johnson River Bridge	3.23	1.09	1	7	...
Shrewsbury	23.97	5.95	5	22	...
Moy Hall, St. Thomas	1.93	0.43	15	8	...
Cedar Valley, St. Thos.	1.82	0.56	14	4	3.35
Hill Gardens	4.69	1.60	5	12	4.34
Buff Bay	13.57	3.13	27	14	9.12
Vinery	16.74	3.59	3	19	...
Windsor, Portland	11.81	5.25	29	18	...
Greenvale, Portland	29.24	9.62	29	21	...
Mt. Holstein	17.05	6.45	29	21	...
Stony Hill Reform.	4.00	1.40	7	8	2.30
Castleton Gardens	12.12	4.04	29	16	4.90
Quebec	10.78	...	...	16	4.76
Water Valley	8.47	1.26	6	19	...
Agualta Vale	7.78	1.30	5	20	...
Hampstead, St. Mary	10.64	1.50	5	16	...
Albany Ry. Station	3.22	1.20	27	12	...
Richmond, St. Mary	14.85	3.95	17	15	4.68
Kendal, St. Mary	13.32	4.80	17	12	...
Gayle, P. W. D.	7.94	1.00	5	19	5.65
Bio Hoe	9.50	3.28	17	14	3.80
Unity Valley	7.56	2.50	17	15	3.35
Moneague	7.15	2.33	17	18	3.68
Union Hill	4.96	1.68	5	7	...
Claremont	6.42	1.40	5	9	5.29
Albion, St. Ann	5.78	1.80	5	17	3.32
Averham Park	8.16	2.21	17	17	4.47
Ballintoy	3.60	0.90	5	9	3.22
Means	7.57	...	...	...	4.91

## FEBRUARY, 1908.

## NORTHERN DIVISION.

	Total Fall.	Greatest fall in 24 hours		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	9.61	3.20	29	13	5.45
Ocho Rios	6.25	1.55	17	12	...
Bogue, Ocho Rios	4.00	1.00	17	14	...
Drax Hall	11.62	3.15	28	11	3.99
Liberty Hill	11.30	4.77	17	11	...
St. Ann's Bay	10.56	3.14	17	18	4.83
Seville	12.05	4.51	17	15	4.10
Richmond Estate	9.79	3.50	17	12	3.89
Llandoverly	14.55	4.18	17	13	3.79
Southfield, St. Ann	10.09	2.47	17	16	...
Brown's Town	7.19	2.04	17	19	4.48
Hyde Park	2.19	0.95	6	6	...
Dry Harbour	6.20	1.30	19	9	...
Chewmagna, St. Ann	4.05	1.20	7	10	...
Home Castle	7.17	2.00	17	15	2.97
Richmond Pen	4.27	0.94	6	9	1.84
Mahogany Hall	8.07	1.90	20	17	2.53
Brampton Bryan	7.00	1.65	20	13	1.58
Bryan Castle	6.41	0.90	28	15	1.91
Braco	8.25	1.50	26	18	2.60
Areadia	7.23	1.40	26	14	2.03
Harmony Hall	9.84	2.64	27	17	2.03
Vale Royal	10.36	2.50	27	14	2.47
Colchis Pen	6.95	2.10	21	9	1.28
Swanswick	7.80	2.15	26	12	...
Hyde	...	...	...	...	...
Georgia	...	...	...	...	...
Long Pond	6.39	2.46	27	9	...
Hyde Hall	4.21	2.00	27	9	...
Steelfield	6.67	2.17	27	13	2.05
Etingdon	5.95	1.70	27	13	...
Oxford	9.45	3.00	27	19	1.82
Cambridge	6.45	3.40	28	11	2.15
Lottery	7.61	1.70	27	15	1.83
Falmouth P.W.D.	5.49	1.19	22	14	1.59
Florence Hall	6.86	1.65	26	18	...
Holland Pen	5.83	1.68	22	11	2.01
Kent	5.41	1.30	17	12	2.25
Canaan	3.81	0.82	27	9	2.26
Lima	3.11	1.00	21	7	...
Content	4.60	1.15	17	9	2.12
Belfield	...	...	...	...	...
Moor Park	4.79	0.84	21	13	...
Success	5.92	2.60	22	9	2.51
Cinnamon Hill	6.91	3.22	22	10	2.47
Rose Hall	7.55	4.00	22	11	2.14
Running Gut	7.63	2.64	22	11	1.98
Montego Bay	5.49	1.90	17	10	1.84
Fairfield, St. James	6.45	2.00	21	9	1.85
Round Hill	4.50	...	...	...	1.26
Sandy Bay	4.94	1.29	17	9	1.76
Lucea	2.37	0.65	11	8	1.91
Westfield	4.64	2.75	18	6	...



CENTRAL SUB-DIVISION.	FEBRUARY, 1908.					SOUTHERN DIVISION.	FEBRUARY, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.		In.	In.			In.
Headworks, Rio Cobre	2.42	1.82	9	10	1.54						
Shanton	2.04	0.53	5	9	...	Morant Point L. H.	2.66	0.59	15	15	2.49
Linstead	...	...	...	...	...	East Prospect	2.09	0.73	13	6	...
Berkshire Hall	5.09	1.60	17	12	...	Morant Bay	2.09	1.18	11	7	2.11
Point Hill	...	...	...	...	...	Easington	0.80	0.50	11	3	1.86
Carew Castle	...	...	...	...	...	Bull Bay	0.11	0.11	11	1	...
Worthy Park	1.26	0.69	13	2	1.93	Gordon Town	3.16	1.33	7	6	...
Chapelton	1.50	0.35	27	8	1.98	Hope Gardens	1.92	0.75	7	6	1.34
Mears	...	...	...	...	...	King's House Garden	0.98	0.24	7	6	1.55
Danks Works	1.14	0.45	5	11	2.03	Half-way Tree	...	...	...	...	...
Savoy House	1.96	0.65	6	11	...	Lunatic Asylum	1.02	0.40	14	5	...
Crofts Hill	1.41	0.52	27	6	...	Kingston S. Camp Rd.	1.57	0.83	7	6	...
Cave Valley	1.17	0.60	17	5	2.18	" P. W. Office	1.29	0.62	7	6	0.78
Means	6.64	...	...	...	2.42	Plumb Point L. H.	0.36	0.13	11	10	0.88
						Ballast Ground	1.04	0.48	14	3	...
WEST CENTRAL DIVISION						Spanish Town	...	...	...	...	...
Baillieston	3.29	1.22	13	9	...	Hog Hole Pen	...	...	...	...	...
Farm Plantation	2.33	0.99	27	7	2.40	Browns Hall	...	...	...	...	...
Brokenhurst	3.59	0.85	7	9	2.44	Old Harbour	...	...	...	...	...
Christiana	2.53	0.60	13	12	2.54	May Pen	4.12	2.06	7	7	1.69
Chndleigh	2.73	0.70	18	8	...	Hillside Estate	0.55	0.37	22	2	...
Shooter's Hill	3.94	3.25	8	7	...	Amity Hall	...	...	...	...	...
Spitzbergen	2.93	0.72	7	9	...	Money Musk	...	...	...	...	...
Kendal, Manchester	4.53	3.50	7	6	2.72	Dunkley's, Vere	0.72	0.40	27	2	...
Marshall's Pen	3.76	1.95	7	8	2.74	Denbigh	2.50	1.05	18	4	1.50
Mandeville, P.W.D	4.12	3.02	7	11	2.41	New Yarmouth	1.55	0.95	27	4	0.91
Carlton, Mandeville	3.40	2.17	7	11	...	Exeter, Vere	0.20	0.10	27	3	...
Fairfield, Manchester	1.87	1.25	7	8	...	Rhymesbury	1.73	1.01	28	4	...
Ulster Spring	5.09	0.90	27	10	2.09	Springfield, Clarendon	0.27	0.27	14	1	1.24
Albert Town	4.78	1.30	6	7	...	Milk River	1.20	0.50	5	4	...
Low River	3.80	1.12	6	10	...	Clarendon Pk. Ry. St.	1.04	0.41	22	5	...
Troy	3.12	1.27	6	5	2.93	Victoria Town	2.19	0.75	2	4	2.02
Fontabelle, Trel.	4.20	0.90	26	12	2.66	Stone's Hope	1.54	0.80	7	6	2.11
Windsor Pen, Trel.	4.13	1.49	26	11	2.25	Newport, Manchester	2.87	1.56	7	6	3.09
Wallingford	2.36	1.06	7	10	...	Great Valley, Man.	2.56	0.75	14	9	...
Balaclava	1.21	0.45	6	8	2.43	Alligator Pond	1.47	0.73	14	7	1.18
Siloah	2.31	0.55	10	7	...	Pepper	2.80	1.60	7	7	2.02
Appleton Estate	4.69	1.57	6	12	2.80	Long Hill	...	...	...	...	...
Maggotty	2.60	0.90	6	11	2.56	Torrington	4.24	1.50	10	10	2.25
Catadupa Rly. Station.	4.34	1.40	13	9	...	Bethlehem, St. Eliz.	3.30	1.04	9	8	...
Kempshot	5.13	1.43	22	11	2.91	Santa Cruz	3.02	1.95	7	6	2.52
Kew Park	3.18	1.08	6	12	2.62	Pedro Plains	1.38	0.35	10	6	...
Hazelymph	2.31	0.58	6	9	2.12	Black River	2.44	0.85	10	10	1.77
King Gate	7.93	2.03	22	11	...	Spring Hill	...	...	...	...	...
Darliston	4.23	3.05	6	6	3.30	Font Hill	2.63	0.90	14	5	0.86
Whithorn	4.82	2.75	6	10	2.95	Peters Ville	7.05	3.11	13	12	2.03
Great Valley	...	...	...	...	...	Mount Edgecombe	4.26	2.38	13	11	2.26
Brownsville	4.97	1.03	18	12	...	Bluefields	4.53	2.03	13	9	...
Fontabelle, Westm.	1.77	0.72	13	6	2.79	Sweet River	2.53	1.90	6	4	2.34
Morgan's Bridge	2.64	1.26	16	8	2.82	Windsor, Sav.-la-Mar	2.15	0.60	5	8	2.39
King's Valley	4.85	2.78	13	8	2.57	Sav.-la-Mar P.W.D.	2.77	0.59	12	10	2.22
Glasgow Estate	6.60	4.34	13	9	...	Retreat	2.29	0.64	14	7	2.23
King's Vale Police St.	5.49	1.11	21	12	...	White Hall	1.92	0.70	13	8	...
						Negril Point L. H.	3.05	1.89	13	7	...
Means	3.56	...	...	...	2.62	Means	2.42	...	...	...	1.83

**NOTES.**  
**COMPARATIVE TABLE OF RAINFALL.**  
*(Based upon the "Average" Stations only.)*

	FEBRUARY.	
	1908.	Average.
	in.	in.
North Eastern Division	7.57	4.91
Northern	6.64	2.42
West Central	3.56	2.62
Southern	2.42	1.83
Means	5.05	2.95

The Rainfall over the Island for February, 1908, was well above the average, as was pointed out in the newspapers previous to this report.

The maximum rainfall recorded was 29.24 in. at Greenvale, Portland, in the north eastern division, and the minimum rainfall recorded was 0.11 in. at Bull Bay, in the southern division.

At George Town, Grand Cayman, the total rainfall for February, 1908, was 1.53 in. : 0.95 in. fell on February 16th and rain fell on four days.

**EARTHQUAKES IN FEBRUARY, 1908.**

Date	Mean time.	Intensity.	Notes : where felt, etc.
Feb. 1	Hr. M 10 15 p.m.	I	Kingston, N 11° E, 0.004; also at Savoy
2	Early	I	Savoy
4	Day time	II	Negril Pt. L H, NW, 0.013
6	12 55 p.m.	II	Denbigh, Suttons, Danks; only sound at Chapelton, Savoy and Claremont. The seismometer in Kingston gave a No. I, SE.

**EARTHQUAKES IN FEBRUARY, 1908, contd.**

Date.	Mean Time.	Intensity.	Notes : where felt, etc.
7	11 5 a.m.	III	Bath, Golden Grove, Manchioneal; loud noise. Felt as a No. I shock at Port Antonio. The church at Golden Grove was damaged
12	12 30 "	II	Halfway Tree
"	1 30 "	I}	Halfway Tree: two shocks between 1 and 2 a.m. At Chapelton there was some sound, and a very light shock NW, 0.002.
23	6 20 p.m.	I	Mount Holstein: double shock, that is to say, two series of vibrations separated by a second or two. It came from SW, and gave the house a twisting movement like the balance wheel of a watch. There was no sound
24	1 9 p.m.	II	Mount Holstein: double shock from S; vibrations up and down; not twisting. It was preceded by a long and loud rumbling sound. Also felt at Clonmel

This table shows considerable activity for February, though only half that of January. The shocks showed the usual characteristics of the new (B) series; in a small locality two or three small shocks are felt within a day or two, and then the shocks are transferred to a far distant locality, and so on.

There was more sound during February than usual.

Chapelton.

MAXWELL HALL,  
Govt. Meteorologist.



JAMAICA

## WEATHER REPORT

FOR THE MONTH OF

MARCH, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations except the Hill Gardens are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. The pressure at the Hill Gardens is reduced to the first three standards only. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

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STATION.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range.	Max.	Date.	Min.	Date.	Range.
	ft.	in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	29.994	30.015	77.0	80.2	81.3	73.1	8.2	85.0	25	69.0	2*	16.0
Negril Point Light House	33	30.011	29.951	73.5	81.8	85.6	68.1	17.5	90.0	11	63.4	8	26.6
Kingston	50	29.992	29.995	71.8	83.4	87.1	68.3	18.8	91.8	9	63.8	6	28.5
Castleton Gardens	496	...	...	66.0	77.6	81.4	66.0	15.4	86.0	*24	61.0	16*	25.0
Hope Gardens	668	29.983	29.934	67.0	79.9	84.3	57.7	26.6	87.0	8	54.0	5*	33.0
Stony Hill Reformatory	1,400	...	...	66.7	76.8	80.1	63.8	16.3	84.0	23	62.0	17*	22.0
Hill Gardens	4,907	25.221	25.224	58.6	61.9	66.3	51.5	14.8	69.0	*14	40	7	29

STATION.	Elevation.	Dew Point and Humidity.		Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
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	ft.	°	°	in.	miles	N	m.	N	m.	L.	M.	U.	L.	M.	U.
Morant Pt. Light House	8	...	...	...	5.52	...	...	NE	10	NE	10.5	1.9	2.3	1.4	1.5
Negril Point Light House	33	85.7	77	67.5	63	1.42	199	NE	4.1	Var	7.3	0.3	1.3	2.0	1.3
Kingston	50	65.5	80	72.5	70	1.27	156	N	4.3	SE	10.9	0.4	1.0	1.0	3.5
Castleton Gardens	496	68.8	93	72.3	81	8.52	...	...	...	...	...	...	...	...	...
Hope Gardens	668	61.6	84	65.1	60	1.80	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory	1,400	63.7	90	70.0	79	3.16	...	...	...	...	...	...	...	...	...
Hill Gardens	4,907	54.3	86	57.6	86	5.56	...	...	...	...	...	...	...	...	...

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Northern and Central	—	22
West Central	—	26
Southern	—	27
		100

NORTH-EASTERN DIVISION.	MARCH, 1908.				
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		Amount.	Date.		
	In.	In.			In.
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Bath	8.26	1.70	12	15	3.10
Boston	7.36	3.62	1	8	5.04
Moore Town	11.40	...	...	...	...
Port Antonio	12.59	4.07	1	18	3.92
Fellowship	10.92	2.46	1	22	4.72
Johnson River Bridge	3.66	0.67	27	14	...
Shrewsbury	19.07	3.99	20	19	...
Cedar Valley, St. Thos.	2.84	0.66	9	8	...
Moy Hall	2.69	0.27	2	18	...
Hill Gardens	5.56	1.05	9	12	5.30
Buff Bay	7.44	1.20	9	15	3.62
Vinery	8.27	3.59	6	15	...
Windsor, Portland	5.03	0.97	11	14	...
Greenvale, Portland	16.23	3.46	9	24	...
Mt. Holstein	14.04	3.29	9	24	...
Stony Hill Reform.	3.16	0.60	19	13	2.65
Castleton Gardens	8.52	2.08	9	16	4.08
Quebec	...	...	...	...	...
Water Valley	3.30	1.10	26	8	...
Agualta Vale	4.01	1.10	27	11	...
Hampstead, St. Mary	4.47	1.08	11	9	...
Albany Ry. Station	4.87	1.50	27	8	...
Richmond, St. Mary	4.23	1.45	27	16	2.28
Kendal, St. Mary	2.82	0.65	30	8	...
Gayle, P. W. D	4.33	1.00	11	15	4.50
Rio Hoe	3.07	0.68	11	14	3.69
Unity Valley	1.84	0.70	10	11	3.76
Moneague	2.47	0.44	1	17	2.57
Union Hill	3.00	...	...	...	...
Claremont	...	...	...	...	...
Albion, St. Ann	2.36	0.64	1	11	3.59
Averham Park	3.76	1.09	11	11	3.38
Ballintoy	1.07	0.37	2	6	3.00
Means	5.39	...	...	...	3.62

## MARCH, 1908.

## NORTHERN DIVISION.

	Total Fall.	Greatest fall in 24 hours		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	5.94	1.34	19	12	2.70
Ocho Rios	2.90	1.00	14	6	...
Bogue, Ocho Rios	2.66	0.57	1	8	...
Drax Hall	2.05	0.55	27	5	3.03
Liberty Hill	5.50	2.04	1	10	...
St. Ann's Bay	3.58	1.89	1	12	1.94
Seville	2.94	2.44	2	7	3.01
Richmond Estate	3.17	1.22	1	7	2.33
Llandovery	2.33	0.81	1	9	2.30
Southfield, St. Ann	2.33	0.66	10	9	...
Brown's Town	2.67	1.25	11	8	2.98
Hyde Park	0.74	0.30	15	4	...
Dry Harbour	0.20	0.20	13	1	...
Chewmagna, St. Ann	0.80	0.45	10	4	...
Home Castle	1.85	1.02	12	5	2.49
Richmond Pen	1.82	0.64	15	3	2.27
Mahogany Hall	0.92	0.47	12	4	2.16
Brampton Bryan	2.43	0.90	1	4	1.85
Bryan Castle	1.81	1.06	1	5	1.86
Braco	0.80	0.30	1	4	1.68
Areadia	2.65	1.18	1	4	1.85
Harmony Hall	0.57	0.25	1	4	1.66
Vale Royal	3.18	1.40	1	4	2.30
Colohis Pen	3.15	2.00	12	2	1.63
Swanswick	3.15	2.20	12	3	...
Hyde	...	...	...	...	...
Georgia	2.00	...	...	...	2.04
Long Pond	2.70	1.40	12	4	...
Hyde Hall	1.80	1.55	11	2	...
Steelfield	1.97	1.02	12	4	2.20
Etingdon	1.20	0.65	12	4	...
Oxford	1.38	0.76	12	7	1.84
Cambridge	1.50	1.20	12	2	2.16
Lottery	1.94	0.97	12	8	1.97
Falmouth P.W.D.	0.90	0.47	12	2	1.80
Florence Hall	1.42	0.90	12	4	...
Holland Pen	1.34	0.77	12	2	1.51
Kent	0.67	0.52	12	2	1.77
Canaan	0.79	0.42	12	4	1.56
Lima	0.48	0.48	12	1	...
Content	0.85	0.45	1	2	2.39
Belfield	0.47	0.41	12	3	...
Moor Park	0.87	0.50	11	5	...
Success	0.70	0.60	12	2	1.91
Cinnamon Hill	0.56	0.56	12	1	1.37
Rose Hall	0.60	0.50	12	2	1.23
Running Gut	0.34	0.34	12	1	1.32
Montego Bay	0.29	0.16	1	2	1.39
Fairfield, St. James	0.40	0.40	12	1	1.47
Round Hill	0.30	...	...	...	1.57
Sandy Bay	1.14	0.79	22	3	1.66
Lucea	0.50	0.13	24	6	1.79
Westfield	3.21	1.52	19	3	...

CENTRAL SUB-DIVISION.	MARCH, 1908.					SOUTHERN DIVISION.	MARCH, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.	In.	In.			In.	
Headworks, Rio Cobre	2.63	0.72	21	11	2.95	Morant Point L. H.	5.52	1.07	20	19	1.78
Shanton	3.52	1.17	2	11	...	East Prospect	5.17	1.17	28	14	...
Linstead	2.87	1.10	11	6	2.24	Morant Bay	3.20	0.61	19	16	0.78
Berkshire Hall	1.07	0.80	10	9	...	Easington	1.69	0.40	28	9	1.19
Point Hill	4.01	1.04	23	11	2.90	Bull Bay	0.77	0.25	8	6	...
Carew Castle	3.33	1.30	19	12	...	Gordon Town	1.28	0.30	2	6	...
Worthy Park	1.71	0.48	19	6	2.67	Hope Gardens	1.80	0.70	12	8	1.63
Chapelton	3.46	1.50	1	6	2.39	King's House Garden	2.60	0.90	13	12	1.26
Mears	...	...	...	...	...	Half-way Tree	...	...	...	...	...
Danks Works	3.66	1.43	1	13	1.98	Lunatic Asylum	1.66	0.62	27	11	...
Savoy House	4.02	1.30	1	13	...	Kingston S. Camp Rd.	1.48	0.50	27	13	...
Crofts Hill	1.65	0.61	22	5	...	" P. W. Office	1.27	0.39	27	9	1.18
Cave Valley	1.85	0.70	1	6	2.78	Plumb Point L. H.	0.60	0.20	9	18	0.99
Means	1.86	...	...	...	2.07	Ballast Ground	0.99	0.25	30	6	...
WEST CENTRAL DIVISION.						Spanish Town	1.58	0.89	28	5	2.42
Baillieston	...	...	...	...	...	Hog Hole Pen	1.97	0.33	28	8	2.42
Farm Plantation	3.69	1.75	20	7	3.14	Browns Hall	2.74	0.82	12	9	...
Brokenhurst	2.50	0.90	12	9	2.70	Old Harbour	6.95	1.52	1	10	2.05
Christiana	2.10	1.10	1	8	3.80	May Pen	3.07	1.12	3	10	1.38
Chudleigh	1.99	0.61	3	8	...	Hillside Estate	...	...	...	...	...
Shooter's Hill	3.11	1.29	2	7	...	Amity Hall	...	...	...	...	...
Spitzbergen	...	...	...	...	...	Money Musk	...	...	...	...	...
Kendal, Manchester	1.05	0.40	12	3	3.80	Dunkley's, Vere	1.27	1.00	3	3	...
Marshalls Pen	2.69	1.15	12	6	3.80	Denbigh	2.20	2.20	3	1	1.97
Mandeville, P.W.D.	3.39	1.59	19	8	4.67	New Yarmouth	2.53	1.48	3	8	1.08
Carlton, Mandeville	3.06	1.51	19	8	...	Exeter, Vere	0.55	0.25	3	4	...
Fairfield, Manchester	1.80	0.63	3	9	...	Rhymesbury	2.74	1.52	3	3	...
Ulster Spring	...	...	...	...	...	Springfield, Clarendon	1.41	1.05	3	3	1.66
Albert Town	3.44	1.00	2	6	...	Milk River	0.59	0.59	31	1	...
Low River	3.60	1.08	2	8	...	Clarendon Pk. Ry. St.	3.40	1.61	1	7	...
Troy	1.92	0.84	16	6	4.59	Victoria Town	2.56	1.50	1	7	1.94
Fontabelle, Trel.	1.35	0.75	12	3	1.93	Stone's Hope	1.75	0.63	21	7	2.66
Windsor Pen, Trel.	0.95	0.58	12	3	2.27	Newport, Manchester	1.32	0.54	4	6	2.81
Wallingford	3.81	1.00	27	9	...	Great Valley, Man.	1.60	0.42	28	7	...
Balaclava	4.15	1.35	3	12	3.26	Alligator Pond	1.26	0.47	3	6	1.84
Siloah	5.05	1.20	13	13	...	Pepper	3.70	1.05	3	11	4.34
Appleton Estate	6.58	1.48	2	15	4.55	Long Hill	...	...	...	...	...
Maggotty	5.39	1.03	27	13	4.99	Torrington	3.46	0.80	12	9	2.92
Ipswich Rly. St.	4.23	0.93	27	11	...	Bethlehem, St. Eliz.	4.75	1.38	1	13	...
Catadupa Rly. Station	1.50	1.15	19	4	...	Santa Cruz	6.61	1.55	13	12	3.29
Kempshot	1.23	0.41	12	6	2.42	Pedro Plains	2.03	0.76	18	6	...
Kew Park	1.89	1.10	18	6	3.66	Black River	5.95	1.38	12	16	2.13
Hazelymph	1.53	1.12	19	3	2.83	Spring Hill	...	...	...	...	...
King Gate	1.16	0.60	1	5	...	Font Hill	4.10	1.15	21	9	1.83
Darliston	8.05	5.25	1	15	6.01	Peters Ville	5.06	2.17	15	13	3.05
Whithorn	6.09	1.80	1	10	4.92	Mount Edgecombe	6.07	2.45	15	15	3.16
Great Valley	...	...	...	...	...	Bluefields	6.89	1.40	27	13	...
Brownsville	3.56	1.40	22	6	...	Sweet River	3.31	0.85	19	8	3.17
Fontabelle, Westm.	5.74	1.38	20	11	3.05	Windsor, Sav.-la-Mar	1.92	0.60	19	9	2.87
Morgan's Bridge	...	...	...	...	...	Sav.-la-Mar P.W.D.	2.20	0.79	25	10	2.55
King's Valley	2.56	0.72	27	12	3.19	Retreat	4.36	1.05	25	7	3.11
Glasgow Estate	1.11	0.70	27	6	...	White Hall	2.72	0.80	22	10	...
King's Vale Police St.	3.79	1.45	27	8	...	Negril Point L. H.	1.42	0.34	24	9	...
Means	3.31	...	...	...	3.66	Means	3.14	...	...	...	2.15

**NOTES.**  
**COMPARATIVE TABLE OF RAINFALL.**  
*(Based upon the "Average" Stations only.)*

	MARCH.	
	1908.	Average.
	In.	In.
North Eastern Division	5.39	3.62
Northern	1.86	2.07
West Central	3.31	3.66
Southern	3.14	2.15
The Island	3.42	2.88

The Rainfall over the Island for March, 1908, was above the average; the forecast issued early in the month was therefore verified.

The maximum rainfall recorded was 19.07 in. at Shrewsbury, Portland, in the north eastern division; and the minimum rainfall recorded was 0.20 in. at Dry Harbour, in the northern division.

At Gordon Town, Grand Cayman, the total rainfall for March, 1908, was 0.30 in. it fell on 21st.

**SHOCKS OF EARTHQUAKE DURING MARCH, 1908.**

Date	Mean time.	Intensity.	Notes : where felt, etc.
Mar. 2	Hr. M 3 19 p.m.	I	Kingston, ENE, 0.006, 4 secs, Moy Hall, 4 or 5 sec. It was II at Kellits and Mt. Holstein. At Unity Valley considerable sound.

**SHOCKS OF EARTHQUAKE DURING MARCH, 1908, contd.**

Date.	Mean Time.	Intensity.	Notes : where felt, etc.
Mar. 3	Hr. M. 4 45 p.m.	I	King's Valley ; 3 sec. : sound.
"	4 46 "	II	do 10 sec. loud sound, both sounds from NW.
5	2 15 a.m.	I	Moy Hall.
19	2 30 "	I	Mt. Holstein.
20	0 40 "	I	do
21	9 15 p.m.	I	Negril.
24	10 45 "	I	King's Valley.
29	1 9 a.m.	I	Kingston. N 0.002, 2 sec. Moy Hall, Mt. Holstein.
"	1 56 "	I	Chapelton, N 22 W, 0.003.

The earthquake activity was less during March than February, and much less than January. The shocks had the same peculiarities as those pointed out in the last Weather Report. The two shocks at King's Valley on the 3rd were unusual and discomposing: the question arose as to what was coming next?

MAXWELL HALL,  
Govt. Meteorologist.



## JAMAICA

## WEATHER REPORT

FOR THE MONTH OF

APRIL, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations except the Hill Gardens are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. The pressure at the Hill Gardens is reduced to the first three standards only. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus; the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATION.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range.	Max.	Date.	Min.	Date.	Range.
	ft.	in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	29.984	29.942	78.5	81.9	83.2	73.9	9.3	85.0	1*	67.0	19*	18.0
Negril Point Light House	33	29.981	29.928	77.2	81.8	85.9	69.6	16.3	88.1	5	65.9	10	22.2
Kingston	50	29.977	29.931	75.9	82.2	87.0	69.8	17.2	89.4	23	66.8	2	22.6
Castleton Gardens	496	...	...	...	...	...	...	...	...	...	...	...	...
Hope Gardens	668	29.968	29.914	71.9	79.6	84.7	63.9	20.8	88.0	4	60.0	1*	28.0
Stony Hill Reformatory	1,400	...	...	68.1	76.7	80.5	64.3	16.2	83.0	2*	63.0	3*	20.0
Hill Gardens	4,907	25.240	25.240	59.6	64.3	68.0	55.2	12.8	70.0	4*	54.0	6*	16.0

STATION.	Elevation.	Dew Point and Humidity.		Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)		Amount of Cloud. Lower, Middle and Upper.								
		7 a.m.	3 p.m.			7 a.m.	3 p.m.	7 a.m.			3 p.m.					
	ft.	°	°	in.	miles			L.	M.	U.	L.	M.	U.			
Morant Pt. Light House	8	...	...	...	2.67	...	E NE 5.6 Var 6.5	1.1	1.7	1.2	0.7	1.5	1.4			
Negril Point Light House	33	69.5	77	69.7	67	1.42	223 E 4.1 Var 8.7	0.3	0.4	1.4	3.5	5.1	0.4			
Kingston	50	66.0	72	70.5	68	0.80	...	N 2.9 SE 12.2	0.7	1.1	0.2	4.1	3.2	0.2		
Castleton Gardens	496	...	...	...	...	...	...	...	...	...	...	...	...			
Hope Gardens	668	65.7	81	69.1	69	1.41	...	...	...	...	...	...	...			
Stony Hill Reformatory	1,400	64.9	89	71.3	83	4.82	...	...	...	...	...	...	...			
Hill Gardens	4,907	55.8	...	59.7	86	4.14	...	...	...	...	...	...	...			

\* and on other days.

## RAINFALL FOR APRIL, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each Division. These results are reproduced in the Comparative Table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four Divisions.

The Northern Division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central Sub-Division; the Southern Division comprises the southern shores from Holland Bay to South Negrit; the North Eastern and west Central Divisions are the remaining parts of the Island bounded by the sea and the other Divisions. Their relative areas are as follows:—

North Eastern Division	—	—	25
Northern and Central	—	—	22
West Central	—	—	26
Southern	—	—	27

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APRIL, 1908.					
NORTH-EASTERN DIVISION.	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
Manchioneal	In. 1.76	In. 0.80	13	8	...
Spring Valley	3.07	0.80	14	9	...
Bath	3.99	1.10	8	16	6.48
Boston	1.59	0.50	6	5	6.79
Moore Town	3.76	...	...	...	...
Port Antonio	3.36	1.30	6	9	6.42
Fellowship	4.60	1.05	8	13	10.47
Johnson River Bridge	2.74	0.65	30	15	...
Shrewsbury	0.99	0.23	8	9	...
Moy Hall, St. Thos.	2.14	0.69	19	14	...
Cedar Valley, St. Thos.	1.86	0.50	8	7	3.02
Hill Gardens	4.14	1.25	5	14	6.80
Buff Bay	3.90	1.10	8	9	7.44
Vinery	3.68	0.75	5	7	...
Windsor, Portland	2.57	0.74	10	8	...
Greenville, Portland	6.72	2.00	5	16	...
Mt. Holstein	5.45	1.25	5	20	...
Hardware Gap	4.82	2.91	22	3	7.30
Stony Hill Reform.	4.82	1.54	23	8	5.61
Castleton Gardens	8.96	2.25	26	17	7.07
Lawrence Tavern	2.21	0.75	17	5	3.87
Water Valley	3.66	0.65	27	10	...
Aqualta Vale	2.10	0.55	5	10	...
Hampstead, St. Mary	2.54	0.60	6	8	...
Albany Ry. Station	5.15	0.75	9	13	...
Richmond, St. Mary	2.40	0.40	5	16	5.40
Kendal, St. Mary	2.60	0.65	5	8	...
Gayle, P. W. D.	2.15	0.74	5	10	5.23
Rio Hoe	3.11	0.67	5	11	4.60
Moneague	2.49	0.62	7	15	4.34
Union Hill	1.90	0.55	9	6	...
Claremont	2.00	0.70	14	4	5.17
Albion, St. Ann	2.39	0.56	5	8	4.68
Averham Park	2.70	0.80	5	12	5.13
Ballintoy	1.81	0.53	26	6	5.10
Means	3.33	...	...	...	5.84

## APRIL, 1908.

## NORTHERN DIVISION.

	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
Port Maria	In. 3.44	In. 1.21	10	6	In. 3.64
Ocho Rios	0.85	0.40	5	3	...
Bogue, Ocho Rios	...	...	...	...	...
Drax Hall	1.27	0.25	5	4	3.03
Liberty Hill	1.81	0.84	5	7	...
St. Ann's Bay	1.31	0.60	5	7	2.96
Seville	1.09	0.38	6	6	2.96
Richmond Estate	1.30	0.50	5	5	3.29
Llandoverly	1.52	0.31	5	3	3.30
Southfield, St. Ann	2.13	1.02	5	5	...
Brown's Town	1.97	1.06	5	6	3.86
Hyde Park	0.00	...	...	...	...
Dry Harbour	0.95	0.50	5	4	...
Chewmagna, St. Ann	0.71	0.60	26	2	...
Home Castle	1.30	0.85	5	2	3.57
Richmond Pen	1.12	0.35	5	3	4.12
Mahogany Hall	1.67	0.66	5	5	4.02
Brampton Bryan	1.04	0.80	5	4	2.21
Bryan Castle	0.91	0.60	5	6	2.17
Braco	0.50	0.25	5	3	2.51
Arcadia	0.69	0.69	2	1	2.53
Harmony Hall	0.50	0.35	5	3	2.27
Vale Royal	1.27	0.85	2	3	3.17
Colobis Pen	1.25	0.50	26	3	3.23
Swanswick	0.95	0.60	5	5	...
Hyde	...	...	...	...	...
Georgia	0.92	0.60	5	2	...
Long Pond	0.73	0.63	5	3	...
Hyde Hall	1.10	0.50	5	3	...
Steelfield	0.85	0.55	5	3	2.72
Etingdon	0.55	0.40	5	3	...
Oxford	1.83	0.85	5	6	2.60
Cambridge	1.17	0.52	5	3	3.14
Lottery	1.52	0.75	5	6	2.39
Falmouth P.W.D.	...	...	...	...	...
Florence Hall	1.16	0.92	29	6	...
Holland Pen	1.18	0.70	29	5	2.53
Kent	1.60	0.60	23	4	2.50
Canaan	2.64	1.64	28	4	3.97
Lima	2.09	1.05	28	6	...
Content	0.87	0.60	28	4	2.16
Bellfield	0.96	0.25	29	5	...
Moor Park	1.96	0.67	28	8	...
Success	2.05	1.20	28	5	2.51
Cinnamon Hill	1.60	0.70	23	5	1.94
Rose Hall	1.60	0.85	28	4	1.88
Running Gut	0.66	0.34	28	4	1.67
Montego Bay	1.32	0.40	21	6	3.25
Fairfield, St. James	0.80	0.35	21	4	3.22
Round Hill	0.45	...	...	...	2.49
Sandy Bay	3.74	1.21	27	8	3.16
Lucea	4.60	1.35	27	11	2.88
Westfield	7.57	1.46	29	13	...



CENTRAL SUB-DIVISION	APRIL, 1908.					SOUTHERN DIVISION.	APRIL, 1908.				
	Total Fall.	Greatest fall in 24 hours.			Average.		Total Fall.	Greatest fall in 24 hours.			Average.
		Amount.	Date.	Days on which 0.01 or more fell.				Amount.	Date.	Days on which 0.01 or more fell.	
	In.	In.			In.		In.			In.	
Headworks, Rio Cobre	2.17	0.37	5	13	3.79	Morant Point L. H.	2.67	0.57	4	15	3.03
Shanton	3.72	1.53	13	18	...	East Prospect	...	...	...	...	...
Linstead	4.05	1.05	2	12	4.57	Morant Bay	2.05	0.35	6	16	2.63
Berkshire Hall	2.76	0.68	19	8	...	Easington	0.74	0.23	19	5	1.50
Point Hill	4.50	1.59	6	10	5.96	Bull Bay	...	...	...	...	...
Carew Castle	3.37	0.60	17	14	...	Gordon Town	1.50	0.47	11	25	3.92
Worthy Park	2.07	0.81	19	5	3.60	Hope Gardens	1.41	0.40	8	10	2.93
Chapelton	2.40	0.90	19	7	3.61	King's House Garden	1.62	0.50	14	11	2.48
Mears	...	...	...	...	...	Half-way Tree	0.92	0.22	7	4	1.61
Danks Works	3.71	1.10	19	9	5.59	Lunatic Asylum	0.16	0.03	13	3	...
Savoy House	3.70	0.99	19	9	...	Kingston S. Camp Rd.	0.15	0.10	11	4	...
Crofts Hill	3.03	1.13	19	7	...	" P. W. Office	0.30	0.15	13	3	1.05
Cave Valley	1.28	0.70	25	3	5.48	Plumb Point L. H.	0.34	0.10	13	12	1.06
Means	1.73	...	...	...	3.18	Ballast Ground	0.49	0.30	11	2	...
						Spanish Town	0.54	0.25	11	4	2.48
WEST CENTRAL DIVISION						Hog Hole Pen	1.09	0.46	9	5	3.13
Baillieston	...	...	...	...	...	Browns Hall	4.33	0.68	7	11	...
Farm Plantation	3.57	1.70	1	6	4.72	Old Harbour	1.26	0.50	10	3	3.09
Brokenhurst	3.05	1.15	26	11	4.93	May Pen	5.03	1.00	13	9	2.47
Christiana	1.82	0.80	19	8	8.38	Hillside Estate	0.84	0.62	19	3	...
Chudleigh	2.94	0.79	19	8	...	Amity Hall	...	...	...	...	...
Shooter's Hill	2.86	0.96	19	8	...	Money Musk	...	...	...	...	...
Spitzbergen	...	...	...	...	...	Dunkley's, Vere	2.06	1.73	19	8	...
Kendal, Manchester	1.40	0.50	8	4	8.40	Denbigh	4.48	0.98	6	9	2.40
Marshall's Pen	2.36	0.60	19	7	5.44	New Yarmouth	2.60	1.50	19	6	2.16
Mandeville, P.W.D.	3.8	1.29	19	13	4.98	Exeter, Vere	1.05	0.60	19	4	...
Carlton, Mandeville	...	...	...	...	...	Rhymesbury	1.65	0.69	13	5	...
Fairfield, Manchester	1.97	0.67	19	6	...	Springfield, Clarendon	0.64	0.28	29	3	3.89
Ulster Spring	1.91	0.83	17	4	...	Milk River	0.95	0.95	30	1	...
Albert Town	5.58	1.10	20	9	...	Clarendon Pk. Ry. St.	1.66	0.43	28	8	...
Low River	2.18	1.15	17	5	...	Victoria Town	1.17	0.39	13	6	4.49
Troy	5.63	1.25	22	6	11.92	Stone's Hope	1.83	0.33	19	11	4.44
Fontabelle, Trel.	3.55	1.00	30	8	4.75	Newport, Manchester	1.98	0.60	19	6	4.42
Windsor Pen, Trel.	6.02	2.42	23	...	6.91	Great Valley, Man.	3.97	1.65	18	10	...
Wallingford	5.90	1.61	17	11	...	Alligator Pond	1.46	0.80	18	5	3.85
Balaclava	6.98	1.36	11	13	11.19	Pepper	2.15	0.75	11	5	8.85
Siloah	7.78	1.20	17	4	...	Long Hill	...	...	...	...	...
Appleton Estate	9.25	1.35	23	17	10.24	Torrington	...	...	...	...	...
Maggotty	8.75	1.31	6	19	10.45	Bethlehem, St. Eliz.	1.45	0.48	18	11	...
Ipswich Rly. St.	12.02	2.35	7	20	...	Santa Cruz	3.65	1.25	17	8	9.26
Catadupa Rly. Station	5.64	1.53	27	12	...	Pedro Plains	0.42	0.17	11	3	...
Kempshot	4.18	1.78	23	9	5.51	Black River	3.84	1.60	9	14	4.08
Kew Park	5.95	1.62	18	13	8.52	Spring Hill	...	...	...	...	...
Hazelymph	6.15	1.50	23	13	6.30	Font Hill	5.05	1.00	9	8	3.34
King Gate	4.18	2.36	21	9	...	Peters Ville	10.49	2.44	11	19	7.07
Darliston	12.72	2.10	27	18	11.52	Mount Edgcombe	8.23	2.13	11	15	6.10
Whithorn	7.24	1.15	6	18	6.82	Bluefields	10.00	1.88	12	17	...
Great Valley	8.44	2.09	28	9	7.45	Sweet River	6.26	1.30	26	16	5.36
Brownsville	12.40	4.13	27	11	...	Windsor, Sav.-la-Mar	4.63	1.84	26	19	4.93
Fontabelle, Westm.	8.02	1.33	26	13	5.22	Sav.-la-Mar P.W.D.	5.44	1.71	26	19	5.53
Morgan's Bridge	7.28	1.54	26	18	4.69	Retreat	4.02	0.83	26	13	5.23
King's Valley	5.69	1.11	29	17	6.12	White Hall	2.70	0.74	26	13	...
Glasgow Estate	6.05	2.05	29	12	...	Negril Point L. H.	1.42	0.56	26	11	...
King's Vale Police St.	7.53	3.53	29	15	...						
Means	5.81	...	...	...	7.35	Means	2.91	...	...	...	3.86

NOTES.  
COMPARATIVE TABLE OF RAINFALL.  
(Based upon the "Average" Stations only.)

	APRIL.	
	1908.	Average.
	In.	In.
North Eastern Division	3.33	5.84
Northern	1.73	3.18
West Central	5.81	7.35
Southern	2.91	3.86
The Island	3.45	5.06

The Rainfall over the Island for April, 1908, was below the average; the forecast issued for April was therefore only partially verified.

The maximum rainfall recorded was 12.72 in. at Darliston in the west central division; and no rain fell at Hyde Park a little north of Cave Valley in St. Ann.

George Town, Grand Cayman:—April.

Total fall 0.33  
Greatest 0.24 on the 18th  
Rainy days 2

SHOCKS OF EARTHQUAKE DURING APRIL, 1908.

Date	Mean time.	Intensity.	Notes: where felt, etc.
Apr. 1	Previous night	I	King's: Valley WNW.
11	Previous night	I	Chapelton.
17	8 30 a.m.	I	Danks, near Chapelton.
19	1 5 "	I	Mt. Holstein.
"	Previous night	I	King's Valley WNW.
26	7 45 p.m.	I	Kingston. E 0.002.
30	10 30 a.m.	I	Mt. Holstein.
"	Noon	I	Siloah.
"	1 p.m.	I	do. some sound.

Some of these shocks were very slight indeed; and the earthquake activity was still decreasing.

1908.	Activity.
Jan.	32
Feb.	17
Mar.	11
April	9

THE JAMAICA HURRICANE OF OCTOBER  
18th, & 19th, 1815.

This extraordinary storm, which lasted at Port Antonio for forty-eight hours, had some features resembling the hurricane of 1880. There were two centres, one of which moved slowly as it developed energy, while the other, fully developed, moved faster along its course toward the west-north-west, the usual

direction. The motion of the former was abnormal; it was first toward the southwest, but when the centre met the Blue Mountain Range south of Port Antonio, it stopped and even recoiled, and then advanced slowly again toward the southwest and Kingston.

Dr. W. Arnold has given a detailed account of the storm, as experienced at Port Antonio, in Vol. II of the Jamaica Physical Journal; he took great pains with the varying directions of the wind, and tabulated them at the end of his account so that there should be no mistake; and by means of a brief account of what occurred in Kingston, as given in the Royal Gazette, it is possible to make a short study of this storm. The small provisional maps attached to this article will be found useful.

Extract from the Royal Gazette. (a)

KINGSTON, Oct. 21st.

SEVERE STORM.

On Tuesday, Oct. 17th, during the afternoon a heavy fall of rain set in, with a fair prospect of good October seasons; but about two o'clock on Wednesday morning it began to blow extremely hard from the eastward, from whence it changed to the SE, and on the following day it shifted to different quarters of the compass, from N to NW and W, and thence to N, from whence it blew a perfect hurricane from about five o'clock in the afternoon, and throughout the night, accompanied with heavy rain. Yesterday the weather moderated considerably, but during last night a strong breeze prevailed, which, however, lulled early this morning. Great damage has been done in all parts of the city, and almost all the wharves have suffered considerably. \* \* \* At Up-Park Camp the new hospital at the west wing, 185 feet in length, occupied by the 18th Regiment of foot, was completely thrown down about two o'clock on Thursday \* \* \*. The old officers' quarters were likewise levelled to the ground, and the well-framed roof completely upset. At Stony Hill, we learn, the two northern barracks are completely uprooted, and the other buildings greatly injured \* \* \*. The north wind occasioned a very heavy sea in Port Royal harbour; \* \* \* in the town of Port Royal the gale was very severely felt: most of the old walls standing after the fire have been tumbled down, and the houses that remained after that calamity, as also others that have since been built, received much injury \* \* \*.

Not one of the mails from the country had arrived at the General Post Office when this paper went to press.

It may here be stated that this hurricane chiefly devastated the districts of St. David, Port Royal, and St. George—that is to say, the mountainous land between Port Antonio and Kingston. Most of the houses in these districts were rebuilt in 1816.

Dr. Arnold's account of the hurricane at Port Antonio. (b)

In the dreadful hurricane of 1815, the sky was previously clear, and a perfect calm pervaded the ocean; gentle westerly winds prevailed for a few days, which increased on the 17th of October and blew strong from that point for about three hours, when the wind veered to the north. (c) It was then evening. Little was thought what was to follow; in fact, we all considered it was nothing more than a north wind of common occurrence. I retired to rest in perfect security little anticipating the fury of the approaching storm. About midnight I was alarmed by the sudden bursting open of doors and shutters; when they were closed and secured they did not prevent the intrusion of the rain; the wind whistled and forced the water literally through every crevice.

It blew all night from ENE; (d) towards daylight it changed again more to the N, (e) the sea rolling into the east harbour in waves of lofty grandeur.

About mid-day of the 18th the wind again changed to ENE, (f) increasing with spiteful fury; and with but trifling

(a) From Saturday October 14, to Saturday October 21, 1815.

(b) Jamaica Physical Journal, Vol. II.

(c) Fig. 1.—The wind had previously been west, due to the developing cyclone A; the cyclone B, advancing along its path, now made its presence felt, and the resulting wind was north.

(d) Fig. 2.—The wind was chiefly influenced by the more powerful cyclone B.

(e) Fig. 3.—The near approach of A produced this change; but there was little wind at both places.

(f) Fig. 4.—The wind was now entirely influenced by A, which had advanced on its course and developed.



## JAMAICA

## WEATHER REPORT

FOR THE MONTH OF

MAY, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations except the Hill Gardens are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. The pressure at the Hill Gardens is reduced to the first three standards only. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus: the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATION.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range.	Max.	Date.	Min.	Date.	Range.
		in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	29.967	29.929	80.7	83.4	85.0	76.9	8.1	87.0	16*	70.0	25	17.0
Negril Point Light House	33	29.958	29.913	79.3	83.3	86.3	72.3	14.0	88.6	10	68.1	15	20.5
Kingston	50	29.957	29.906	79.6	84.3	88.7	73.0	15.7	92.1	19	70.0	24	22.1
Castleton Gardens	496	...	...	67.6	81.4	88.3	67.6	20.7	91.0	4	65.0	7*	26.0
Hope Gardens	668	29.961	29.888	80.8	83.9	89.3	73.8	15.5	93.0	6	66.0	2*	27.0
Stony Hill Reformatory	1,400	...	...	70.7	79.7	84.2	67.3	16.9	88.0	15	65.0	18	23.0
Hill Gardens	4,907	25.237	25.231	61.9	65.9	70.1	56.0	14.1	73.0	15	55.0	1*	18.0

STATION.	Elevation.	Dew Point and Humidity.				Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
		7 a.m.		3 p.m.				7 a.m.		3 p.m.		7 a.m.			3 p.m.		
		°		°				in.	miles	E	m.	E	m.	L.	M.	U.	L.
Morant Pt. Light House .	8	...	...	...	...	0.99	...	SE	7.7	SE	9.5	1.3	1.8	1.2	1.2	1.8	1.6
Negril Point Light House	33	71.6	77	72.3	70	6.23	214	E	2.7	SE	10.4	0.9	0.4	2.8	2.2	6.1	0.6
Kingston	50	67.8	67	70.0	62	1.61	...	N	3.7	SE	15.2	0.3	1.1	2.1	2.3	1.7	2.6
Castleton Gardens	496	65.8	93	72.3	76	4.53	...	...	...	...	...	...	...	...	...	...	...
Hope Gardens	668	78.3	90	69.7	62	3.74	...	...	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory	1,400	68.1	91	72.0	77	8.08	...	...	...	...	...	...	...	...	...	...	...
Hill Gardens	4,907	55.3	77	61.9	87	3.84	...	...	...	...	...	...	...	...	...	...	...

\* and on other days.

## RAINFALL FOR MAY, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each Division. These results are reproduced in the Comparative Table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four Divisions.

The Northern Division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central Sub-Division; the Southern Division comprises the southern shores from Holland Bay to South Negril; the North Eastern and west Central Divisions are the remaining parts of the Island bounded by the sea and the other Divisions. Their relative areas are as follows:—

North Eastern Division	—	25
Northern and Central	—	22
West Central	—	26
Southern	—	27

100

NORTH-EASTERN DIVISION.		May, 1908.				
		Total Fall.	Greatest fall in 24 hours		Days on which 0.01 or more fell.	Average.
			Amount.	Date.		
	In.	In.	In.			In.
Manchioneal	1.87	0.90	18	9	21.00	
Spring Valley	2.73	0.53	23	10	...	
Bath	2.87	0.90	31	16	14.87	
Boston	1.68	1.02	22	8	23.51	
Moore Town	4.69	...	...	...	...	
Port Antonio	4.26	1.29	8	10	20.45	
Fellowship	3.40	0.93	8	15	28.43	
Johnson River Bridge	1.43	0.56	1	7	...	
Shrewsbury	3.94	2.46	25	9	...	
Moy Hall, St. Thos.	6.36	2.55	20	8	...	
Cedar Valley, St. Thos.	5.62	2.45	19	9	13.39	
Hill Gardens	3.84	1.77	22	4	11.41	
Buff Bay	0.55	0.25	24	3	9.30	
Vinery	2.63	0.52	1	7	...	
Windsor, Portland	1.98	0.90	18	2	...	
Greenvale, Portland	4.33	1.80	23	9	...	
Mt. Holstein	4.32	2.24	23	11	...	
Hardware Gap	6.05	...	...	...	16.05	
Stony Hill Reform.	8.08	2.12	22	9	10.31	
Castleton Gardens	4.53	1.20	19	10	13.12	
Lawrence Tavern	5.46	1.24	22	8	11.19	
Water Valley	1.86	0.48	26	5	...	
Agualta Vale	1.15	0.32	26	6	...	
Hampstead, St. Mary	4.04	2.25	24	5	...	
Albany Ry. Station	...	...	...	...	...	
Richmond, St. Mary	2.23	0.70	24	10	8.88	
Kendal, St. Mary	1.83	1.10	21	6	...	
Gayle, P. W. D	0.77	0.35	24	16	...	
Rio Hoe	2.35	1.07	15	8	9.90	
Moneague	2.38	1.09	24	9	10.44	
Union Hill	4.05	1.13	19	8	...	
Claremont	1.67	1.00	23	4	9.12	
Albion, St. Ann	2.49	1.62	20	4	8.73	
Averham Park	3.44	1.46	18	9	8.95	
Ballintoy	2.44	0.98	25	4	7.77	
Means	3.40	...	...	...	14.46	

## NORTHERN DIVISION.

	Total Fall.	Greatest fall in 24 hours		Days on which 0.01 or more fell.	Average.
	In.	Amount.	Date.		
	In.	In.			In.
Port Maria	1.09	0.42	24	7	7.39
Ocho Rios	0.35	0.80	23	2	...
Bogue, Ocho Rios	3.51	0.87	23	7	...
Drax Hall	0.45	0.36	25	2	7.97
Liberty Hill	1.29	0.70	25	4	...
St. Ann's Bay	0.13	0.13	25	1	7.60
Seville	0.14	0.14	21	1	7.77
Richmond Estate	...	...	...	...	...
Llandoverly	0.00	0.00	0	0	7.68
Southfield, St. Ann	0.99	0.64	24	3	...
Brown's Town	4.00	1.76	24	7	8.89
Hyde Park	4.81	2.30	19	5	...
Dry Harbour	3.60	1.70	1	6	...
Chewmagna, St. Ann	6.90	2.24	19	10	...
Home Castle	4.18	2.10	1	7	6.84
Richmond Pen	4.79	1.15	21	7	8.49
Mahogany Hall	7.47	2.51	20	15	8.87
Brampton Bryan	3.04	0.94	24	7	5.69
Bryan Castle	2.66	1.35	20	6	5.49
Braco	2.35	1.20	20	7	5.34
Arcadia	1.95	0.53	21	6	5.08
Harmony Hall	2.42	0.90	1	8	5.12
Vale Royal	2.47	0.66	1	7	6.67
Colchis Pen	4.35	1.20	20	7	8.12
Swanswick	4.20	1.25	13	8	...
Hyde	...	...	...	...	...
Georgia	2.28	1.00	25	6	6.17
Long Pond	3.17	0.62	26	9	...
Hyde Hall	2.50	1.00	25	6	...
Steelfield	2.50	0.90	26	5	6.13
Etingdon	1.40	0.64	25	4	...
Oxford	2.50	1.75	25	6	6.53
Cambridge	4.21	1.60	25	6	7.42
Lottery	4.50	1.81	25	7	6.82
Falmouth P.W.D.	3.36	1.50	25	7	5.77
Florence Hall	2.83	1.71	25	6	...
Holland Pen	4.41	2.31	8	4	5.98
Kent	1.45	0.50	8	6	6.11
Canaan	3.84	0.82	21	13	8.63
Lima	1.60	0.40	13	7	...
Content	1.10	0.70	11	3	8.06
Bellfield	2.68	0.67	8	11	...
Moor Park	4.09	1.45	24	12	...
Success	2.10	1.80	11	3	5.00
Cinnamon Hill	2.44	2.00	11	4	5.44
Rose Hall	2.95	2.55	11	5	4.93
Running Gut	3.35	2.22	11	6	5.50
Montego Bay	5.00	1.60	19	9	8.42
Fairfield, St. James	4.35	1.15	19	10	9.42
Round Hill	4.90	...	...	...	7.60
Sandy Bay	6.06	1.11	9	12	9.13
Lucea	7.17	1.61	20	12	9.19
Westfield	10.25	1.54	21	18	...

CENTRAL SUB-DIVISION.	MAY, 1908.					SOUTHERN DIVISION.	MAY, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.		In.	In.			In.
Headworks, Rio Cobre	2.36	0.74	18	6	8.56	Morant Point L. H.	0.99	0.42	20	12	11.97
Shanton	...	...	...	...	...	East Prospect	2.03	0.60	22	8	...
Linstead	...	...	...	...	...	Morant Bay	0.47	0.18	16	7	9.66
Berkshire Hall	3.80	1.60	14	9	...	Easington	1.84	0.50	24	6	7.16
Point Hill	...	...	...	...	...	Bull Bay	0.30	0.30	25	1	4.01
Carew Castle	...	...	...	...	...	Gordon Town	2.08	0.90	22	6	10.64
Worthy Park	2.51	0.92	22	7	8.61	Hope Gardens	3.74	1.74	22	5	7.01
Chapelton	2.02	0.63	23	6	8.87	King's House Garden	2.77	1.50	23	5	7.32
Mears	...	...	...	...	...	Half-way Tree	3.39	1.33	23	3	...
Danks Works	3.25	1.36	22	10	11.09	Lunatic Asylum	0.56	0.19	23	5	...
Savoy House	3.19	1.37	22	10	...	Kingston S. Camp Rd.	1.54	0.79	24	4	...
Crofts Hill	5.07	1.59	22	8	...	" P. W. Office	1.61	1.02	24	4	5.00
Cave Valley	5.59	1.95	19	9	10.37	Plumb Point L. H.	0.28	1.16	23	8	5.23
Means	3.20	...	...	...	7.27	Ballast Ground	2.35	1.51	23	4	...
WEST CENTRAL DIVISION						Spanish Town	...	...	...	...	...
Baillieston	...	...	...	...	...	Hog Hole Pen	...	...	...	...	...
Farm Plantation	3.70	2.00	31	6	10.18	Browns Hall	...	...	...	...	...
Brokenhurst	5.25	1.55	25	12	10.06	Old Harbour	...	...	...	...	...
Christiana	10.63	5.63	19	10	12.19	May Pen	1.07	0.56	23	4	8.31
Chudleigh	10.44	5.83	19	8	...	Hillside Estate	1.10	0.58	2	3	...
Shooter's Hill	6.15	1.88	23	11	...	Amity Hall	...	...	...	...	...
Spitzbergen	...	...	...	...	...	Money Musk	...	...	...	...	...
Kendal, Manchester	5.79	2.00	19	7	11.90	Dunkley's Vere	1.40	1.04	23	3	...
Marshalls Pen	7.10	3.50	19	10	11.68	Dry River	0.92	0.62	23	6	...
Mandeville, P.W.D.	6.86	2.64	19	12	12.36	Caswell Hill	2.81	2.41	23	4	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	...	...	...	...	...
Fairfield, Manchester	3.35	1.70	19	9	...	New Yarmouth	0.80	0.75	23	2	5.92
Uister Spring	6.87	1.28	1	14	15.00	Exeter, Vere	1.15	0.90	23	4	...
Albert Town	7.12	1.20	19	11	...	Rhymesbury	1.26	0.53	8	4	...
Low River	12.43	6.25	22	9	...	Springfield, Clarendon	0.78	0.63	23	2	7.36
Troy	6.10	1.60	1	6	19.38	Milk River	...	...	...	...	...
Fontabelle, Trel.	5.55	0.95	19	16	11.40	Clarendon Pk. Ry. St.	1.00	0.29	23	6	...
Windsor Pen, Trel.	10.34	1.64	25	19	12.32	Victoria Town	2.66	0.93	18	5	11.99
Wallingford	6.73	2.30	22	8	...	Stone's Hope	4.89	3.58	19	6	9.74
Balaclava	7.14	2.52	2	11	16.22	Newport, Manchester	5.62	2.10	19	8	8.97
Siloah	11.30	2.50	21	12	...	Great Valley, Man.	1.66	0.92	19	4	...
Appleton Estate	11.50	3.12	2	13	10.24	Alligator Pond	0.64	0.22	25	5	6.18
Maggotty	12.08	3.20	31	15	16.46	Pepper	5.05	1.70	19	7	12.85
Ipswich Rly. St.	13.72	3.48	1	13	...	Long Hill	...	...	...	...	...
Catadupa Rly. Station	17.62	2.75	1	18	...	Unity, Malvern	5.76	2.50	19	4	...
Kempshot	6.68	1.61	8	20	10.67	Torrington	1.10	0.66	19	6	8.59
Kew Park	...	...	...	...	...	Bethlehem, St. Eliz.	2.47	1.35	19	7	...
Hazelymph	11.50	3.60	2	17	12.34	Santa Cruz	6.93	2.00	18	9	13.16
King Gate	11.85	2.09	1	14	...	Pedro Plains	0.64	0.36	19	4	...
Darliston	10.01	2.80	22	16	19.75	Black River	3.68	1.45	22	9	7.61
Whithorn	12.10	2.10	2	17	17.97	Spring Hill	...	...	...	...	...
Great Valley	17.66	4.10	11	14	14.86	Font Hill	1.30	0.50	15	4	10.12
Brownsville	14.77	1.44	19	23	...	Peters Ville	4.54	1.43	31	12	12.94
Fontabelle, Westm.	10.31	2.71	2	10	8.84	Mount Edgewcombe	3.51	1.03	31	10	8.00
Morgan's Bridge	14.33	3.07	2	12	13.90	Bluefields	8.83	2.50	21	10	...
King's Valley	13.88	2.06	14	15	12.82	Sweet River	8.60	1.85	21	11	10.04
Glasgow Estate	11.88	1.95	31	16	...	Windsor, Sav.-la-Mar	11.26	3.02	2	16	9.67
King's Vale Police St.	11.33	1.77	20	23	...	Sav.-la-Mar P.W.D.	8.04	1.87	2	16	10.82
						Retreat	8.12	2.55	21	12	9.66
						White Hall	7.48	2.11	2	15	...
						Negril Point L. H.	6.23	2.59	2	12	...
Means	9.48	...	...	...	13.20	Means	8.61	...	...	...	9.01

NOTES.  
COMPARATIVE TABLE OF RAINFALL.

(Based upon the "Average" Stations only.)

	MAY.	
	1908.	Average.
	In.	In.
North Eastern Division	3.40	14.46
Northern	3.20	7.27
West Central	9.48	13.20
Southern	3.61	9.01
The Island	4.92	10.98

The Rainfall over the Island for May, 1908, was well below the average; the forecast of "about the average" was not verified.

The maximum rainfall recorded was 17.66 in. at Great Valley, Hanover, in the west central division; no rain fell at Llandovery in the northern division; and at a dozen other stations under 1 inch fell for the whole month.

At George Town, Grand Cayman, for May, 1908: -

5.31 in. fell on eleven days -

1.16 in. fell on 26th May.

MAGNETIC VARIATION: Mr. E Foster, F.S.I., reports the Mag. var. at Montego Bay for May, 1908, to be 2° 12' east.

SHOCKS OF EARTHQUAKE DURING MAY, 1908.

Date	Mean time.	Intensity.	Notes: where felt, etc.
	Hr. M		
2	1 30 p.m.	I	Mt. Holstein.
14	10 46 a.m.	I	Kingston. N & S 0.006; 2sec; Chapelton, NW 0.003; Moy Hall, 2 sec.; Savoy; Mt. Holstein.
16	7 15 p.m.	I	Brownsville.

On the 14th at Siloah two dangerous walls fell at different hours and at different places, but there was no earthquake shock.

The earthquake activity was still decreasing in May, 1908.

	Activity.
Jan.	32
Feb.	17
Mar.	11
April	9
May	3

In the *Weather Report* for February the characteristics of the new series of shocks were thus described: "In a small locality two or three small shocks are felt within a day or two, and then the shocks are transferred to a far distant locality, and so on."

But on the 14th May we had a shock of the old series; light, but widely extended. It was felt between the Blue Mountains and Chapelton; and the seismometers at Kingston and Chapelton placed the epicentre some miles south of Kingston. It apparently belongs to the 6th set of shocks on p. 23 of the Report on the Earthquake of Jan. 14th, 1907.

This shock, light but widely extended, shows that the focus was much deeper below the surface than the shocks of the new series: and some attempt must be made to measure the depth of the foci as shocks occur if we wish to form any idea at all of what is occurring below the surface.

The next point is that if we examine the table on p. 25 of that Report, or still better, an activity curve drawn by means of the table, we shall find that a maximum occurred very regularly every 21 days. The weeks are measured from Jan. 14th, 1907, and the weeks Nos. 7, 10, 13, &c., are all maximum weeks; and the series continued to week No. 28, July 23rd to 28th, when the series stopped.

But if we count onwards we shall find that week No. 70, May 11th to 17th, 1908, would be a maximum week; and as the shock we are discussing occurred on May 14th, there can be no doubt that this shock belonged to the former series; so it would appear that the after-shocks occur at longer and longer intervals of time rather than die out altogether; and that the period of 21 days of the Jamaica after-shocks is a physical fact, although no explanation is at present forthcoming.

MAXWELL HALL,  
Govt. Meteorologist, Chapelton.

No. 354.



JAMAICA

# WEATHER REPORT

FOR THE MONTH OF

JUNE, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations except the Hill Gardens are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. The pressure at the Hill Gardens is reduced to the first three standards only. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus: the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATION.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range.	Max.	Date.	Min.	Date.	Range.
	ft.	in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House .	8	29.984	29.952	...	...	...	...	...	...	...	...	...	...
Negril Point Light House	33	29.966	29.933	78.9	83.9	87.8	72.7	14.6	91.9	28	68.4	3	23.5
Kingston	50	29.964	29.927	77.8	83.9	87.8	72.8	15.0	91.6	11	68.5	8	23.1
Castleton Gardens	496	...	...	69.2	81.1	88.3	69.2	19.1	93.0	12*	65.0	9	28.0
Hope Gardens	668	29.967	29.912	77.0	84.8	89.7	68.1	21.6	93.0	28*	63.0	7	30.0
Stony Hill Reformatory .	1,400	...	...	71.6	82.7	86.3	68.4	17.9	92.0	13	66.0	4	26.0
Hill Gardens	4,907	25.236	25.236	63.5	67.1	70.0	58.2	11.8	75.0	28	56	1*	19.0

STATION.	Elevation.	Dew Point and Humidity.		Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)			Amount of Cloud, Lower, Middle and Upper.					
		7 a.m.	3 p.m.			7 a.m.	3 p.m.		7 a.m.			3 p.m.		
	ft.	°	°	in.	miles	7 a.m.	3 p.m.		L.	M.	U.	L.	M.	U.
Morant Pt. Light House .	8	...	...	...	5.84	...	...	E 10.4	1.5	2.2	1.4	1.9	1.8	1.6
Negril Point Light House	33	71.7	79	74.0	72	6.83	219	SE 3.9	11.4	2.0	0.6	4.9	3.6	3.4
Kingston	50	69.5	76	72.1	68	6.98	...	N 4.6	16.4	1.5	0.7	3.2	1.0	2.0
Castleton Gardens	496	67.4	93	73.2	76	12.48	...	...	...	...	...	...	...	...
Hope Gardens	668	69.5	79	71.1	63	6.75	...	...	...	...	...	...	...	...
Stony Hill Reformatory .	1,400	69.5	93	71.6	69	7.07	...	...	...	...	...	...	...	...
Hill Gardens	4,907	56.7	78	62.4	84	12.74	...	...	...	...	...	...	...	...

\* and on other days.

## RAINFALL FOR JUNE, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each Division. These results are reproduced in the Comparative Table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four Divisions.

The Northern Division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central Sub-Division; the Southern Division comprises the southern shores from Holland Bay to South Negril; the North Eastern and west Central Divisions are the remaining parts of the Island bounded by the sea and the other Divisions. Their relative areas are as follows:

North Eastern Division	-	25
Northern and Central	-	22
West Central	-	26
Southern	-	27
		100

NORTH-EASTERN DIVISION.	JUNE, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Manchioneal	6.31	4.25	2	7	7.27
Spring Valley	6.21	3.50	2	8	...
Bath	7.60	4.10	2	16	10.15
Boston	11.55	7.70	2	3	18.33
Moore Town	13.53	...	...	...	...
Port Antonio	22.09	12.30	2	15	17.38
Fellowship	22.82	10.65	2	14	19.85
Johnson River Bridge	14.44	7.00	3	19	...
Shrewsbury	16.12	4.85	6	9	...
Moy Hall, St. Thos.	17.89	6.70	3	11	...
Cedar Valley, St. Thos.	20.2	7.90	2	7	...
Hill Gardens	12.74	5.07	2	6	7.29
Buff Bay	7.62	5.45	2	8	7.07
Vinery	8.21	6.30	2	5	...
Windsor, Portland	6.99	4.86	2	7	...
Greenvale, Portland	8.94	5.30	2	7	...
Mt. Holstein	8.81	4.79	2	10	...
Hardware Gap	6.40	...	...	...	5.03
Stony Hill Reform.	7.07	4.80	2	5	6.76
Castleton Gardens	12.48	6.11	2	9	9.27
Lawrence Tavern	9.18	4.40	2	5	5.58
Water Valley	8.17	5.60	2	6	...
Agualta Vale	7.72	5.90	2	4	...
Hampstead, St. Mary	11.96	6.05	2	6	...
Albany Ry. Station	8.55	5.50	2	3	...
Richmond, St. Mary	12.59	6.25	2	9	4.74
Kendal, St. Mary	13.07	...	...	7	...
Gayle, P. W. D	15.41	5.10	4	9	7.42
Rio Hoe	22.18	8.12	3	10	8.63
Moneague	21.87	8.16	3	12	6.27
Union Hill	18.38	7.21	3	9	...
Claremont	16.64	5.28	4	7	4.94
Albion, St. Ann	17.48	7.50	3	7	6.32
Averham Park	16.11	5.64	2	8	5.11
Ballintoy	20.12	9.03	3	9	4.56
Means	14.12	...	...	...	8.52

## JUNE, 1908.

## NORTHERN DIVISION.

	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	8.02	3.40	4	6	5.24
Ocho Rios	7.30	5.00	3	4	...
Bogue, Ocho Rios	10.38	5.80	3	8	...
Drax Hall	14.03	5.70	3	6	4.72
Liberty Hill	15.01	5.52	2	8	...
St. Ann's Bay	13.44	5.55	3	4	3.42
Seville	11.78	4.62	2	7	4.71
Richmond Estate	11.57	4.75	2	6	5.10
Llandoverly	12.62	5.70	2	4	4.30
Southfield, St. Ann	13.66	6.20	2	8	...
Brown's Town	13.68	5.67	3	8	3.49
Hyde Park	10.60	2.60	4	6	...
Dry Harbour	6.80	3.10	2	3	...
Chewmagna, St. Ann	12.97	4.32	3	9	...
Home Castle	10.85	4.75	2	7	3.69
Richmond Pen	10.92	4.35	3	6	4.84
Mahogany Hall	11.69	4.13	2	9	4.96
Brampton Bryan	11.02	3.76	2	7	3.02
Bryan Castle	7.40	2.80	4	7	2.89
Braco	7.95	3.10	2	7	2.87
Arcadia	10.07	3.72	2	6	3.98
Harmony Hall	10.49	5.80	3	7	...
Vale Royal	13.51	5.44	3	9	4.07
Colchis Pen	9.70	4.00	2	5	...
Swanwick	10.35	3.80	3	10	...
Hyde	...	...	...	...	...
Georgia	10.60	5.25	3	8	3.45
Long Pond	10.41	5.20	3	6	...
Hyde Hall	7.64	3.65	3	5	...
Steelfield	8.32	4.35	3	7	4.12
Etingdon	6.57	3.15	3	7	...
Oxford	6.64	3.00	3	7	...
Cambridge	7.20	2.80	2	8	4.50
Lottery	6.39	2.61	2	7	3.72
Falmouth P.W.D.	6.64	4.20	3	5	2.22
Florence Hall	4.76	2.09	2	7	...
Holland Pen	10.11	4.09	3	6	...
Kent	6.18	3.80	4	5	3.34
Canaan	9.14	5.30	3	9	5.07
Lima	5.96	3.58	3	5	...
Content	5.75	3.55	3	3	3.28
Bellfield	6.36	3.85	3	8	...
Moor Park	8.47	4.43	3	14	...
Success	5.25	3.50	3	5	...
Cinnamon Hill	5.35	3.20	3	4	...
Rose Hall	6.00	3.50	3	4	...
Running Gut	5.19	3.12	3	3	...
Montego Bay	5.19	2.48	3	8	6.87
Fairfield, St. James	5.40	3.00	3	5	...
Round Hill	7.75	...	...	...	6.11
Sandy Bay	11.13	5.22	3	10	4.85
Lucea	11.85	4.48	3	13	7.33
Westfield	8.79	4.11	3	18	...



CENTRAL SUB-DIVISION.	JUNE, 1908.					SOUTHERN DIVISION.	JUNE, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
Headworks, Rio Cobre	In. 7.98	In. 5.43	2	4	In. 5.75	Morant Point L. H.	In. 5.84	In. 4.18	3	11	In. 6.61
Shanton	...	...	...	...	...	East Prospect	6.74	4.36	2	16	...
Linstead	13.09	4.80	2	8	7.41	Morant Bay	9.64	5.93	2	16	6.42
Berkshire Hall	12.10	3.80	2	9	...	Easington	15.05	7.08	2	10	6.98
Point Hill	18.61	7.28	2	4	3.38	Bull Bay	9.63	4.50	2	4	2.28
Carew Castle	...	...	...	...	...	Gordon Town	8.82	4.40	2	4	2.88
Worthy Park	16.80	5.59	4	9	6.32	Hope Gardens	6.75	4.13	2	3	4.46
Chapelton	14.08	4.30	2	6	6.22	King's House Garden	8.34	6.14	2	6	5.16
Mears	...	...	...	...	...	Half-way Tree	8.18	6.33	2	3	1.97
Danks Works	14.40	5.80	2	6	3.56	Lunatic Asylum	8.68	6.50	2	4	...
Savoy House	13.08	4.94	2	6	...	Kingston S. Camp Rd.	8.21	5.76	2	5	...
Crofts Hill	13.55	4.93	4	5	...	" P. W. Office	6.93	5.04	2	4	3.52
Cave Valley	16.82	5.10	3	9	6.79	Plumb Point L. H.	6.78	5.05	2	5	3.71
Means	10.78	...	...	...	4.54	Ballast Ground	8.47	6.06	2	4	...
WEST CENTRAL DIVISION.						Spanish Town	7.98	6.04	2	3	4.37
Baillieston	...	...	...	...	...	Hog Hole Pen	...	...	...	...	...
Farm Plantation	...	...	...	...	...	Browns Hall	15.12	7.30	2	5	...
Brokenhurst	22.00	10.65	2	10	12.50	Old Harbour	12.00	9.00	2	4	6.21
Christiana	10.88	4.29	2	7	5.33	May Pen	12.62	9.77	2	4	4.16
Chudleigh	9.44	3.59	2	7	...	Hillside Estate	10.84	9.59	2	5	...
Shooter's Hill	11.37	5.55	2	7	...	Amity Hall	...	...	...	...	...
Spitzbergen	...	...	...	...	...	Money Musk	...	...	...	...	...
Kendal, Manchester	12.70	4.55	2	8	6.12	Dunkley's Vere	14.23	12.00	2	6	...
Marshall's Pen	12.95	7.67	2	7	6.69	Dry River	12.73	9.85	2	7	...
Mandeville, P.W.D.	16.33	5.96	2	12	6.90	Caswell Hill "	...	...	...	...	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	...	...	...	...	...
Fairfield, Manchester	10.66	6.79	2	6	...	New Yarmouth	13.97	12.10	2	4	2.46
Ulster Spring	12.48	4.00	2	6	4.42	Exeter, Vere	11.23	8.90	2	8	...
Albert Town	10.31	6.00	2	6	...	Rhymesbury	16.36	13.80	2	5	...
Low River	10.78	4.20	2	9	...	Springfield, Clarendon	11.28	10.07	2	4	10.01
Troy	8.40	4.22	5	2	4.03	Milk River	11.40	11.40	2	1	...
Fontabelle, Trel.	10.35	3.80	3	13	7.04	Clarendon Pk. Ry. St.	12.83	6.25	2	6	...
Windsor Pen, Trel.	12.04	2.95	3	11	9.43	Victoria Town	16.75	11.05	2	5	4.22
Wallingford	6.60	3.23	2	3	...	Stone's Hope	14.56	8.54	2	8	8.94
Balaclava	5.27	2.20	4	3	2.28	Pratville	13.75	10.00	2	4	...
Siloah	5.10	2.75	2	4	...	Newport, Manchester	25.16	15.80	2	6	5.27
Appleton Estate	6.16	2.92	2	5	6.84	Great Valley, Man.	9.72	7.25	2	7	...
Maggotty	6.74	3.10	2	9	4.02	Alligator Pond	10.05	7.73	2	5	3.84
Ipswich Rly. St.	12.42	4.80	3	12	...	Pepper	10.10	6.00	2	3	4.33*
Catadupa Rly. Station	12.67	6.20	3	18	...	Long Hill	9.67	4.00	2	3	5.18*
Kempshot	7.98	3.60	3	14	9.24	Unity, Malvern	...	...	...	...	...
Kew Park	...	...	...	...	...	Torrington	7.60	5.05	2	4	2.39
*Hazelymph	11.88	4.70	3	18	9.27	Bethlehem, St. Eliz.	8.23	5.20	2	6	...
King Gate	10.46	2.56	3	16	...	Santa Cruz	6.28	3.70	2	6	5.02
Darliston	17.93	11.50	3	2	7.24	Pedro Plains	5.64	2.66	2	6	...
Whithorn	13.26	6.40	3	15	7.13	Black River	4.40	2.75	2	5	3.36
*Great Valley, Han.	10.91	4.10	3	15	13.34	Spring Hill	...	...	...	...	...
Brownsville	16.53	3.52	3	20	...	Font Hill	9.10	4.85	4	3	3.76*
Fontabelle, Westm.	9.79	4.65	3	12	10.30	Peters Ville	14.56	8.20	3	10	6.18
Belleisle	10.33	5.63	3	9	10.58	Mount Edgecombe	14.73	9.21	3	11	5.91
Morgan's Bridge	9.09	3.04	3	17	8.63	Bluefields	17.01	4.38	3	18	...
King's Valley	9.30	3.40	3	17	11.58	Sweet River	7.65	4.00	4	7	6.83*
Glasgow Estate	7.70	4.00	3	13	...	Windsor, Sav.-la-Mar	8.86	5.75	3	14	6.26
King's Vale Police St.	11.28	4.58	3	19	...	Sav.-la-Mar P.W.D.	9.21	5.74	3	11	4.44
Means	11.27	...	...	...	7.76	Retreat	...	...	...	...	...
						White Hall	4.40	2.20	3	8	...
						Negril Point L. H.	6.83	2.66	4	6	...
						Means	10.42	...	...	...	4.87

\* Gauge overflowed.

NOTES.  
COMPARATIVE TABLE OF RAINFALL.  
(Based upon the "Average" Stations only.)

	JUNE.	
	1908.	Average.
	In.	In.
North Eastern Division	14.12	8.52
Northern	10.78	4.54
West Central	11.27	7.76
Southern	10.42	4.87
The Island	11.65	6.42

The Rainfall over the Island for June, 1908, was therefore twice the average. The greatest rainfall was 25.16 in. at Newport, Manchester, in the Southern Division; the lowest was 4.40 in. at Black River and White Hall in the Southern Division.

This large Island rainfall was almost entirely due to a large and shallow barometric depression which generated on June 1st, and gave much needed rains on the 2nd, 3rd and 4th. The conditions were similar to those in 1886: the May rainfall in each case was below the forecast; the barometric fall was too small to attract attention; the rains were heavy and continuous; but this year we escaped the disastrous floods of 1886.

Had it not been for the occurrence of this depres-

sion, which may be regarded as accidental in considering rainfall processes, the rainfall for June would have been below the average; and the forecast for July was based upon this circumstance.

HAIL fell during thunderstorms at Windsor Pen, Trelawny, on the 10th, at Brown's Town on the 20th, and at Mount Edgecombe on the 24th.

SHOCKS OF EARTHQUAKE DURING JUNE, 1908.

Date	Mean time.	Intensity.	Notes: where felt, etc.
	Hr. M		
2	4 30 a.m.	I	Brownsville
5	1 4 p.m.	I	Falmouth: Windsor Pen.
17	4 55 a.m.	I	Mt. Holstein: sound.
22	4 30 p.m.	I	do. do.
27	4 40 p.m.	I	Kingston: 0.002: 1 sec.: sound.
28	2 30 a.m.	I	Windsor Pen., Trel.

The earthquake activity, therefore, slightly increased during June.

1908. Activity.

Jan.	..	32
Feb.	..	17
Mar.	..	11
April	..	9
May	..	8
June	..	6

MAXWELL HALL, Govt. Meteorologist.

Chapelton.

\* Special inquiry was made as to this exceptionally large fall.

No. 355.



JAMAICA

# WEATHER REPORT

FOR THE MONTH OF

JULY, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations except the Hill Gardens are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. The pressure at the Hill Gardens is reduced to the first three standards only. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus; the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATIONS	Elevation. ft.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range	Max.	Date.	Min.	Date.	Range
	in.	in.	°	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	29.992	29.963	...	...	...	...	...	...	...	...	...	...
Negril Point Light House	33	29.990	29.959	78.5	82.8	87.6	72.3	15.3	89.9	18	69.9	18	20.0
Kingston	50	29.981	29.947	77.5	85.8	90.0	73.2	16.8	92.9	6*	69.9	10	23.0
Castleton Gardens	496	...	...	69.6	82.8	89.2	69.6	19.6	92.0	8	67.0	23	25.0
Hope Gardens	668	29.999	29.893	75.4	85.3	90.2	67.7	22.5	93.0	1*	63.0	2	30.0
Stony Hill Reformatory	1,400	...	...	71.2	81.2	87.7	68.2	19.5	92.0		67.0	23*	25.0
Hill Gardens	4,907	25.253	25.241	62.5	66.7	72.1	59.2	12.9	75.0	5	58.0	3*	17.0

STATIONS.	Elevation. ft.	Dew Point and Humidity.		Rainfall. in.	Wind per diem. miles	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
		7 a.m.	3 p.m.			7 a.m.	8 p.m.	7 a.m.	8 p.m.	7 a.m.			3 p.m.		
		°	°			m.	m.	L.	M.	U.	L.	M.	U.		
Morant Pt. Light House	8	...	...	...	0.86	...	E 6.8	E	8.6	1.2	1.8	1.4	1.3	1.8	1.6
Negril Point Light House	33	73.5	85	73.9	75	8.60	189	NE	2.0	E	7.4	0.5	0.0	4.8	4.0
Kingston	50	69.7	77	71.7	64	0.95	...	N	3.8	SE	14.3	0.5	1.0	2.0	0.7
Castleton Gardens	496	67.8	93	73.4	71	3.92	...	...	...	...	...	...	...	...	...
Hope Gardens	668	66.6	78	69.6	62	2.64	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory	1,400	68.6	91	71.8	73	5.16	...	...	...	...	...	...	...	...	...
Hill Gardens	4,907	53.2	83	62.0	84	1.49	...	...	...	...	...	...	...	...	...

\* and on other days.

## RAINFALL FOR JULY, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each Division. These results are reproduced in the Comparative Table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four Divisions.

The Northern Division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central Sub-Division; the Southern Division comprises the southern shores from Holland Bay to South Negril; the North Eastern and west Central Divisions are the remaining parts of the Island bounded by the sea and the other Divisions. Their relative areas are as follows:—

North Eastern Division	—	—	25
Northern and Central	—	—	22
West Central	—	—	26
Southern	—	—	27

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JULY, 1908.					
NORTH-EASTERN DIVISION.	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell	Average.
		Amount.	Date.		
	In.	In.			In.
Manchioneal	4.95	1.10	14	11	8.24
Spring Valley	...	...	...	...	...
Bath	3.43	0.70	15	14	10.80
Boston	4.28	1.50	12	6	8.09
Moore Town	11.60	...	...	...	...
Port Antonio	6.12	1.45	5	12	11.67
Fellowship	13.04	3.40	5	15	16.89
Johnson River Bridge	3.05	0.50	14	16	...
Shrewsbury	10.17	2.89	12	22	...
Moy Hall, St. Thos.	2.61	0.58	16	9	...
Cedar Valley, St. Thos.	2.56	1.00	14	5	8.52
Hill Gardens	1.49	1.05	15	8	4.04
Buff Bay	4.38	1.88	16	8	8.04
Vinery	3.69	0.77	16	9	...
Windsor, Portland	3.09	0.80	16	8	...
Greenvale, Portland	3.87	1.25	15	10	...
Mt. Holstein	3.72	1.33	15	15	...
Hardware Gap	2.90	...	...	...	4.32
Stony Hill Reform.	5.16	1.40	27	15	5.58
Castleton Gardens	3.92	1.03	16	13	6.43
Lawrence Tavern	4.96	1.95	1	12	5.96
Water Valley	1.94	0.60	15	5	...
Agualta Vale	1.33	0.50	15	5	...
Hampstead, St. Mary.	2.76	0.70	31	4	...
Albany Ry. Station	...	...	...	...	...
Richmond, St. Mary	3.19	1.50	23	10	4.25
Kendal, St. Mary	3.41	...	...	...	...
Gayle, P. W. D.	1.87	0.74	16	7	2.99
Rio Hoe	3.05	0.71	15	8	4.62
Moneague	3.94	1.16	2	13	4.81
Union Hill	3.99	0.55	1	11	...
Claremont	2.11	1.20	2	4	4.21
Albion, St. Ann	2.45	1.01	22	8	4.41
Averham Park	4.72	2.40	22	9	3.74
Ballintoy	2.14	0.33	9	11	3.49
Means	4.03	...	...	...	6.55

Richmond Pen	2.27	1.09	9	6	3.12
Mahogany Hall	2.12	0.81	28	7	4.12
Brampton Bryan	0.85	0.30	29	5	2.22
Bryan Castle	0.92	0.50	23	6	1.80
Braco	1.10	0.45	25	6	1.86
Arcadia	1.06	0.77	18	3	2.03
Harmony Hall	1.05	0.25	23	7	1.57
Vale Royal	0.79	0.33	18	4	3.07
Colehis Pen	1.25	0.80	9	2	3.18
Swanswick	3.90	1.20	18	9	...
Hyde	...	...	...	...	...
Georgia	1.32	0.37	27	6	2.41
Long Pond	3.30	1.15	18	8	...
Hyde Hall	1.21	0.40	18	7	...
Steelfield	2.05	0.85	27	8	3.06
Etingdon	1.15	0.55	27	6	...
Oxford	0.76	0.20	1	6	2.41
Cambridge	1.40	0.80	18	4	3.33
Lottery	1.04	0.44	1	6	2.39
Falmouth P.W.D.	0.24	0.24	15	1	1.67
Florence Hall	0.23	0.21	1	2	...
Holland Pen	0.41	0.30	15	2	1.91
Kent	1.12	0.45	22	5	1.73
Canaan	3.48	1.40	2	4	3.14
Lima	0.18	0.10	1	2	...
Content	0.08	0.05	24	2	2.20
Bellfield	1.27	0.32	1	7	...
Hampton	1.81	0.32	15	3	...
Moor Park	1.61	0.88	2	7	...
Success	0.00	...	...	...	1.63
Cinnamon Hill	0.55	0.25	16	5	1.11
Rose Hall	0.40	0.15	16	4	1.00
Running Gut	1.06	0.41	2	4	1.07
Montego Bay	2.21	0.62	2	9	3.66
Fairfield, St. James	1.85	0.70	23	3	4.00
Round Hill	3.80	...	...	...	4.11
Sandy Bay	2.74	1.25	2	6	5.46
Lucea	2.59	0.66	3	10	4.86
Westfield	9.42	2.59	22	17	...

## JULY, 1908.

## NORTHERN DIVISION.

	In.	In.		In.
Port Maria	4.72	1.25	16	10 4.13
Ocho Rios	3.15	1.20	22	6 ...
Bogue, Ocho Rios	2.28	0.63	22	9 ...
Drax Hall	2.16	0.70	16	5 2.76
Liberty Hill	1.32	0.50	16	6 ...
St. Ann's Bay	2.28	0.60	4	7 3.37
Seville	1.19	0.40	14	6 2.34
Richmond Estate	2.14	0.42	14	7 2.28
Llandoverly	2.91	0.86	13	8 1.91
Southfield, St. Ann	2.03	0.36	13	9 ...
Brown's Town	0.75	0.26	22	5 3.31
Hyde Park	1.71	0.70	29	5 ...
Dry Harbour	0.70	0.45	14	2 ...
Chewmagna, St. Ann	0.93	0.19	13	7 ...
Home Castle	0.60	0.25	16	4 2.19
Richmond Pen	2.27	1.09	9	6 3.12
Mahogany Hall	2.12	0.81	28	7 4.12
Brampton Bryan	0.85	0.30	29	5 2.22
Bryan Castle	0.92	0.50	23	5 1.80
Braco	1.10	0.45	25	6 1.86
Arcadia	1.06	0.77	18	3 2.03
Harmony Hall	1.05	0.26	23	7 1.57
Vale Royal	0.79	0.33	18	4 3.07
Colchis Pen	1.25	0.80	9	2 3.18
Swanswick	3.90	1.26	18	9 ...
Hyde	...	...	...	...
Georgia	1.32	0.37	27	6 2.41
Long Pond	3.30	1.15	18	8 ...
Hyde Hall	1.21	0.40	18	7 ...
Steelfield	2.05	0.85	27	8 3.06
Etingdon	1.15	0.55	27	6 ...
Oxford	0.76	0.20	1	6 2.41
Cambridge	1.40	0.80	18	4 3.33
Lottery	1.04	0.44	1	6 2.39
Falmouth P.W.D.	0.24	0.24	15	1 1.67
Florence Hall	0.23	0.21	1	2 ...
Holland Pen	0.41	0.30	15	2 1.91
Kent	1.12	0.45	22	5 1.73
Canaan	3.48	1.40	2	4 3.14
Lima	0.18	0.10	1	2 ...
Content	0.08	0.05	24	2 2.20
Bellfield	1.27	0.32	1	7 ...
Hampden	1.81	0.32	15	3 ...
Moor Park	1.61	0.88	2	7 ...
Success	0.00	...	...	...
Cinnamon Hill	0.55	0.25	16	5 1.63
Rose Hall	0.40	0.15	16	4 1.11
Running Gut	1.06	0.41	2	4 1.00
Montego Bay	2.21	0.62	2	9 1.07
Fairfield, St. James	1.85	0.70	23	3 3.86
Round Hill	3.80	...	...	...
Sandy Bay	2.74	1.25	2	6 4.11
Lucea	2.59	0.66	3	10 5.46
Westfield	9.42	2.59	22	17 4.86

CENTRAL SUB-DIVISION.	JULY, 1908.					SOUTHERN DIVISION.	JULY, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
Headworks, Rio Cobre	In. 3.90	In. 1.56	26	11	In. 4.19	Morant Point L. H.	In. 0.86	In. 0.26	17	13	In. 3.24
Shanton	...	...	...	...	...	East Prospect	2.04	0.44	4	11	...
Linstead	3.42	1.00	25	12	6.13	Morant Bay	2.50	0.48	21	15	6.52
Berkshire Hall	3.84	1.00	18	14	...	Easington	2.02	0.65	15	5	6.88
Point Hill	4.53	1.25	14	6	6.43	Bull Bay	0.80	0.48	14	2	2.71
Carew Castle	3.70	0.48	21	10	...	Gordon Town	1.87	0.45	11	7	3.29
Worthy Park	2.31	0.66	2	8	4.34	Hope Gardens	2.64	0.50	16	11	2.93
Chapelton	1.20	0.42	21	6	4.35	King's House Garden	2.00	0.30	26	11	2.84
Mears	...	...	...	...	...	Half-way Tree	1.00	0.63	20	4	2.06
Danks Works	3.73	1.42	27	8	4.28	Lunatic Asylum	0.86	0.54	14	4	...
Savoy House	3.48	1.25	27	9	...	Kingston S. Camp Rd.	1.19	0.58	13	7	...
Crofts Hill	...	...	...	...	...	" P. W. Office	0.95	0.55	14	7	1.87
Cave Valley	1.65	0.55	5	4	4.95	Plumb Point L. H.	0.52	0.20	13	8	2.08
Means	1.77	...	...	...	3.04	Ballast Ground	1.26	0.44	11	4	...
WEST CENTRAL DIVISION.						Spanish Town	0.92	0.38	13	6	2.73
Baillieston	...	...	...	...	...	Hog Hole Pen	1.36	0.42	27	6	2.91
Farm Plantation	...	...	...	...	...	Browns Hall	3.32	0.70	15	9	...
Brokenhurst	...	...	...	...	...	Old Harbour	1.39	1.00	16	3	3.05
Christiana	2.19	0.50	14	7	4.90	May Pen	2.17	0.80	13	5	4.01
Chudleigh	2.39	0.67	14	8	...	Hillside Estate	0.71	0.38	14	2	...
Shooter's Hill	2.23	0.96	21	7	...	Amity Hall	...	...	...	...	...
Spitzbergen	2.37	0.95	27	8	...	Money Musk	...	...	...	...	...
Kendal, Manchester	2.30	1.13	22	6	6.14	Dunkley's, Vere	1.00	0.34	13	3	...
Marshall's Pen	2.99	1.05	21	7	5.45	Dry River	1.24	0.64	13	3	...
Mandeville, P.W.D.	3.63	1.21	21	10	6.24	Caswell Hill	...	...	...	...	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	...	...	...	...	...
Fairfield, Manchester	1.83	0.63	13	7	...	New Yarmouth	1.45	0.80	13	3	2.93
Ulster Spring	3.12	1.00	9	7	4.71	Exeter, Vere	0.75	0.30	11	3	...
Albert Town	0.93	0.82	25	2	...	Rhymesbury	0.73	0.30	13	3	...
Low River	1.63	1.00	21	5	...	Springfield, Clarendon	0.67	0.42	13	3	4.54
Troy	5.72	1.00	9	7	7.99	Milk River	...	...	...	...	...
Fontabelle, Trel.	4.60	1.70	29	11	5.46	Clarendon Pk. Ry. St.	2.87	2.02	21	3	...
Windsor Pen, Trel.	5.80	2.40	27	12	6.69	Victoria Town	1.22	0.47	16	5	3.86
Wallingford	6.75	1.73	27	10	...	Stone's Hope	1.29	0.38	26	5	5.28
Balaclava	5.92	1.73	27	9	6.04	Pratville	...	...	...	...	...
Siloah	9.49	3.25	21	13	...	Newport, Manchester	2.08	0.74	21	5	5.32
Appleton Estate	8.15	2.63	21	14	7.58	Great Valley, Man.	0.53	0.23	16	4	...
Maggotty	9.46	1.64	13	16	8.98	Alligator Pond	0.13	0.13	16	1	3.64
Ipswich Rly. St.	6.21	1.04	8	14	...	Pepper	1.20	0.35	13	5	3.45
Catadupa Rly. Station	11.75	2.00	5	14	...	Long Hill	...	...	...	...	...
Kempshot	3.29	1.00	2	12	6.39	Unity, Malvern	...	...	...	...	...
Kew Park	...	...	...	...	...	Torrington	1.77	0.72	31	4	3.32
Hazelymph	12.06	2.62	24	19	9.49	Bethlehem, St. Eliz.	1.52	0.33	21	9	...
King Gate	3.78	1.04	23	11	...	Santa Cruz	8.16	3.00	25	7	5.99
Darliston	15.40	2.93	10	20	12.72	Pedro Plains	0.64	0.16	15	5	...
Whithorn	12.52	1.80	22	22	11.69	Black River	4.45	1.92	13	12	5.08
Great Valley, Han.	11.26	3.35	24	12	10.61	Spring Hill	...	...	...	...	...
Brownsville	9.82	3.19	4	18	...	Fout Hill	2.20	0.80	11	7	6.66
George's Plain	14.33	2.47	14	22	...	Peters Ville	...	...	...	...	...
Fontabelle, Westm.	12.47	1.68	5	21	8.55	Mount Edgcombe	4.11	1.04	4	15	6.99
Belleisle	15.40	2.30	14	20	8.77	Bluefields	...	...	...	...	...
Morgan's Bridge	10.28	1.37	14	20	11.44	Sweet River	10.75	1.82	29	14	7.43
King's Valley	11.36	2.17	22	20	11.89	Windsor, Sav.-la-Mar	9.81	1.67	22	18	6.99
Glasgow Estate	...	...	...	...	...	Sav.-la-Mar P.W.D.	6.96	1.20	11	18	6.10
King's Vale Police St.	9.61	1.61	6	22	...	Retreat	12.94	2.45	14	18	8.19
Means	7.90	...	...	...	8.08	White Hall	7.20	1.25	14	17	...
						Negril Point L. H.	8.60	1.33	22	15	...
						Means	3.00	...	...	...	4.41

# NOTES.

## COMPARATIVE TABLE OF RAINFALL.

(Based upon the "Average" Stations only.)

	JULY.	
	1908.	Average.
	In.	In.
North Eastern Division	4.08	6.55
Northern	1.77	3.04
West Central	7.90	8.08
Southern	3.00	4.41
The Island	4.17	5.52

The Rainfall over the Island for July, 1908, was below the average : therefore the forecast was verified.

The greatest fall was 15.40 in : at Dailiston & Belleisle in the west central division : no rain fell at Success in the Northern division, and at 3 or 4 other stations practically nil was recorded.

At Georgetown, Grand Cayman ;

June, 1908 : Total fall 2.64 in : on 12 days ;

Greatest fall 0.61 in : on the 24th June ;

July, 1908 : Total fall 1.81 in, on 9 days.

Greatest fall 0.60 in, on 15th July.

## SHOCKS OF EARTHQUAKE DURING JULY, 1908.

Date	Mean time. Hr. M.	Intensity.	Notes : where felt, etc.
	Nil		

1908.	Activity.
Jan.	32
Feb.	17
Mar.	11
April	9
May	3
June	6
July	0

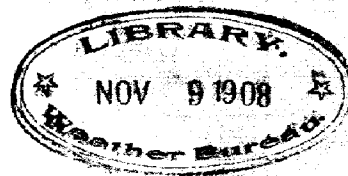
MAXWELL, HALL Govt. Meteorologist.

Chapelton.

No. 356.



JAMAICA



# WEATHER REPORT

FOR THE MONTH OF

AUGUST, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations except the Hill Gardens are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. The pressure at the Hill Gardens is reduced to the first three standards only. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus; the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATIONS.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range	Max.	Date.	Min.	Date.	Range
	ft.	in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	29.982	29.935	...	...	...	...	...	...	...	...	...	...
Negril Point Light House	33	29.964	29.923	79.8	84.1	87.9	72.6	15.3	90.0	22	69.1	19	20.9
Kingston	50	29.952	29.927	78.8	84.5	90.7	74.1	16.6	93.1	4*	71.9	17	21.2
Castleton Gardens	496	...	...	71.2	81.8	88.7	70.4	18.3	92	3	69	5*	23
Hope Gardens	668	29.962	29.929	74.7	83.3	90.5	67.9	22.6	94	31	65	1*	29
Stony Hill Reformatory	1,400	...	...	72.1	79.2	86.4	63.0	18.4	90	10	67	15	23
Hill Gardens	4,907	25.248	25.228	61.4	66.6	73.7	58.7	15.0	77	22	57	9	20

STATIONS.	Elevation.	Dew Point and Humidity.				Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
		7 a.m.		3 p.m.				7 a.m.		3 p.m.		7 a.m.			3 p.m.		
		°	°	°	°			in.	miles		m.		m.	L.	M.	U.	L.
Morant Pt. Light House .	8	...	...	...	...	2.38	..	E	7.2	E	9.4	1.3	2.3	1.5	1.8	1.9	1.6
Negril Point Light House	33	72.4	78	73.9	72	10.04	200	NE	3.6	E	4.8	0.3	0.5	3.6	1.3	7.2	0.0
Kingston	50	68.3	70	78.5	70	1.41	...	N	3.8	SE	12.0	0.4	0.9	2.0	3.2	1.8	2.8
Castleton Gardens	496	70.1	96	75.6	82	14.47	...	...	...	...	...	...	...	...	...	...	...
Hope Gardens	668	66.4	73	70.1	64	2.97	...	...	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory	1,400	68.8	89	72.7	80	10.36	...	...	...	...	...	...	...	...	...	...	...
Hill Gardens	4,907	58.5	93	61.7	84	3.02	...	...	...	...	...	...	...	...	...	...	...

\* and on other days.

## RAINFALL FOR AUGUST, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each Division. These results are reproduced in the Comparative Table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four Divisions.

The Northern Division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central Sub-Division; the Southern Division comprises the southern shores from Holland Bay to South Negril; the North Eastern and west Central Divisions are the remaining parts of the Island bounded by the sea and the other Divisions. Their relative areas are as follows:—

North Eastern Division	—	25
Northern and Central	—	22
West Central	—	26
Southern	—	27

100

Aug., 1908.

NORTH-EASTERN DIVISION.	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Manchioneal	3.72	1.05	14	10	7.46
Spring Valley	4.88	1.00	16	11	...
Bath	9.12	1.90	26	23	9.55
Boston	2.82	1.92	14	2	11.07
Moore Town	9.50	...	...	...	...
Port Antonio	4.57	1.05	27	10	10.67
Fellowship	7.74	1.30	26	15	10.66
Johnson River Bridge	6.87	1.02	26	17	...
Shrewsbury	3.74	1.17	12	11	...
Moy Hall, St. Thos.	3.64	0.72	26	13	...
Cedar Valley, St. Thos.	3.05	0.70	26	9	7.76
Hill Gardens	3.02	0.70	5	12	8.36
Buff Bay	2.03	0.90	25	7	4.37
Vinery	1.69	0.59	14	5	...
Windsor, Portland	1.76	0.55	23	8	...
Greenvale, Portland	3.19	1.20	25	10	...
Mt. Holstein	7.98	1.86	5	18	...
Hardware Gap	3.54	...	...	...	5.82
Stony Hill Reform.	10.36	2.28	23	...	10.08
Castleton Gardens	14.47	3.83	24	22	10.70
Lawrence Tavern	14.04	4.11	16	...	7.84
Water Valley	3.25	0.81	19	7	...
Agualta Vale	3.17	1.20	19	8	...
Albany Ry. Station	2.52	0.92	22	6	...
Richmond, St. Mary	6.85	2.25	28	16	5.84
Hampstead, St. Mary	1.93	0.57	28	7	...
Kendal, St. Mary	4.68	1.00	25	8	...
Gayle, P. W. D.	5.38	0.98	27	14	5.66
Rio Hoe	5.17	0.96	16	11	6.68
Moneague	6.91	1.07	20	20	5.72
Union Hill	5.22	0.95	8	12	...
Claremont	2.89	0.58	29	9	6.14
Albion, St. Ann	7.35	1.42	28	14	6.37
Averham Park	3.52	0.76	28	12	4.71
Ballintoy	...	...	...	...	...
Means	6.68	...	...	...	7.62

## NORTHERN DIVISION.

Aug., 1908.

	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	4.26	1.65	30	11	4.09
Ocho Rios	6.06	2.00	16	7	...
Bogue, Ocho Rios	3.47	0.94	19	11	...
Drax Hall	2.58	0.84	27	11	3.86
Liberty Hill	...	...	...	...	...
St. Ann's Bay	3.75	1.10	27	9	3.27
Seville	2.62	1.12	27	6	3.58
Richmond Estate	3.23	1.55	21	8	3.85
Landoverly	2.49	1.10	28	6	3.10
Southfield, St. Ann	3.24	1.30	28	11	...
Brown's Town	3.52	0.88	15	13	3.54
Hyde Park	6.88	2.70	23	7	...
Dry Harbour	1.95	0.55	17	5	...
Chewmagna, St. Ann	...	...	...	...	...
Home Castle	3.80	1.30	15	7	3.72
Richmond Pen	...	...	...	...	...
Mahogany Hall	6.99	2.65	23	15	6.45
Brampton Bryan	3.01	0.85	15	7	3.42
Bryan Castle	3.36	1.07	17	10	3.04
Braco	3.35	1.20	17	10	3.24
Arcaha	5.40	1.42	17	5	3.67
Harmony Hall	2.91	1.20	28	11	2.86
Vale Royal	5.51	1.78	17	5	4.78
Colchis Pen	11.00	3.75	23	10	5.67
Swanswick	8.15	2.00	9	11	...
Hyde	...	...	...	...	...
Georgia	4.67	1.65	9	14	3.97
Long Pond	7.72	2.45	9	12	...
Hyde Hall	9.68	2.46	9	13	...
Steelfield	5.10	1.60	9	12	3.81
Etingdon	4.51	1.80	9	14	...
Oxford	6.88	2.60	9	12	3.06
Cambridge	8.90	2.30	14	11	3.81
Lottery	8.56	2.14	14	12	3.69
Falmouth P.W.D.	6.25	2.05	28	9	2.89
Florence Hall	7.35	3.45	9	10	...
Holland Pen	...	...	...	...	...
Kent	2.90	0.45	18	13	3.16
Canaan	7.69	1.20	18	12	4.84
Lima	4.45	1.00	13	12	...
Content	4.18	0.85	29	13	4.69
Bellfield	6.59	1.27	13	14	...
Hampden	7.07	1.60	28	12	...
Moor Park	6.06	1.10	8	15	...
Success	2.70	0.80	9	10	2.07
Cinnamon Hill	2.24	0.68	18	12	2.11
Rose Hall	2.05	0.75	18	12	1.95
Running Gut	2.84	0.98	18	11	2.64
Montego Bay	11.37	3.10	14	17	5.60
Fairfield, St. James	7.10	2.30	14	11	6.17
Round Hill	8.25	...	...	...	5.20
Sandy Bay	7.44	1.50	12	14	5.44
Lucea	3.92	0.59	20	16	6.09
Westfield	14.70	2.38	28	15	...



CENTRAL SUB-DIVISION.	Aug, 1908.					SOUTHERN DIVISION.	Aug, 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.		In.	In.			In.
Headworks, Rio Cobre	6.13	3.90	23	11	5.87	Morant Point L. H.	2.38	0.38	10	19	5.28
Shanton	...	...	...	...	...	East Prospect	3.89	1.17	26	16	...
Linstead	9.02	2.02	12	23	7.59	Morant Bay	2.88	0.70	26	20	5.18
Berkshire Hall	6.60	1.70	21	9	...	Easington	7.15	2.10	26	14	5.19
Point Hill	5.05	1.04	9	7	6.62	Bull Bay	0.57	0.39	15	2	2.48
Carew Castle	11.68	1.64	20	17	...	Gordon Town	3.18	1.65	25	8	3.01
Worthy Park	4.29	1.50	14	8	4.75	Hope Gardens	2.97	1.35	25	10	5.71
Chapelton	7.28	2.12	23	11	7.53	King's House Garden	2.04	1.02	25	10	5.67
Mears	...	...	...	...	...	Half-way Tree	2.45	1.20	26	6	2.60
Danks Works	7.64	2.65	23	14	5.47	Lunatic Asylum	...	...	...	...	...
Savoy House	8.10	2.35	23	15	...	Kingston S. Camp Rd.	1.89	0.89	23	10	...
Crofts Hill	5.10	1.46	14	9	...	" P. W. Office	1.41	0.78	23	9	4.05
Cave Valley	11.40	2.50	14	11	7.40	Plumb Point L. H.	0.62	0.16	26	10	3.74
Means	5.40	...	...	...	4.35	Ballast Ground	1.84	1.25	23	5	...
WEST CENTRAL DIVISION						Spanish Town	1.83	1.06	23	4	4.39
Baillieston	7.99	1.94	23	15	...	Hog Hole Pen	1.99	1.92	23	5	4.92
Farm Plantation	...	...	...	...	...	Browns Hall	6.39	1.18	14	11	...
Brokenhurst	5.29	1.14	23	12	7.74	Old Harbour	2.28	0.86	4	4	4.07
Christiana	11.47	2.46	25	16	5.20	May Pen	4.59	1.70	11	9	3.74
Chudleigh	...	...	...	...	...	Hillside Estate	3.25	1.26	16	8	...
Shooter's Hill	4.97	1.37	25	11	...	Amity Hall	...	...	...	...	...
Spitzbergen	7.23	1.40	25	15	...	Money Musk	...	...	...	...	...
Kendal, Manchester	4.49	0.70	25	11	7.07	Dunkley's, Vere	2.05	0.47	16	7	...
Marshall's Pen	7.49	1.36	25	14	9.39	Dry River	2.45	0.89	16	9	...
Mandeville, P.W.D.	8.13	1.44	25	21	8.55	Caswell Hill	...	...	...	...	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	...	...	...	...	...
Fairfield, Manchester	5.62	1.59	5	17	...	New Yarmouth	2.63	0.97	16	6	3.49
Ulster Spring	7.82	1.64	7	13	7.01	Exeter, Vere	4.62	1.25	15	10	...
Albert Town	10.06	1.63	12	12	...	Rhymesbury	1.53	0.60	14	4	...
Low River	6.29	1.36	5	8	...	Springfield, Clarendon	3.50	0.87	27	8	3.49
Troy	21.31	2.70	7	17	7.87	Milk River	1.80	0.90	16	2	...
Fontabelle, Trel.	8.70	2.60	14	18	6.50	Clarendon Pk. Ry. St.	1.58	0.55	14	5	...
Windsor Pen, Trel.	11.61	2.60	14	19	8.66	Victoria Town	3.47	1.17	15	7	3.20
Wallingford	10.25	4.92	14	14	...	Stone's Hope	5.00	1.25	26	14	6.08
Balaclava Pol. Sta.	9.11	2.25	14	13	6.60	Pratville	...	...	...	...	...
Siloah	15.14	5.60	14	14	...	Newport, Manchester	7.86	3.27	23	10	4.86
Appleton Estate	15.47	4.82	14	17	10.51	Great Valley, Man.	3.46	1.08	15	12	...
Maggotty	13.66	2.83	14	18	11.04	Alligator Pond	3.60	1.22	4	8	3.42
Ipswich Rly. St.	11.36	1.92	28	16	...	Pepper	9.50	3.50	4	9	6.50
Springfield, St. Eliz.	11.16	1.42	30	17	...	Long Hill	10.20	3.15	25	14	6.61
Oatadupa Rly. Station	8.41	1.90	23	15	...	Unity, Malvern	...	...	...	...	...
Kempshot	10.12	2.08	15	23	8.73	Torrington	3.39	0.95	23	9	4.52
Kew Park	...	...	...	...	...	Bethlehem, St. Eliz.	6.30	1.42	4	16	...
Hazelymph	8.78	1.63	27	25	11.13	Santa Cruz	11.25	1.82	25	18	9.24
King Gate	6.34	1.14	8	16	...	Pedro Plains	3.35	1.10	26	10	...
Darlston	15.97	2.74	14	20	14.62	Black River	8.30	1.40	25	19	5.84
Whithorn	11.20	1.50	14	23	11.05	Spring Hill	...	...	...	...	...
Great Valley, Han.	7.06	2.25	28	15	...	Font Hill	6.30	1.50	11	13	5.00
Brownsville	14.56	3.59	28	24	...	Peters Ville	10.50	2.10	14	17	9.71
George's Plain	6.16	1.31	14	15	...	Mount Edgecombe	8.57	2.37	12	17	7.18
Fontabelle, Westm.	...	...	...	...	...	Bluefields	13.68	2.90	13	15	...
Belleisle	8.88	1.80	25	19	10.31	Sweet River	9.06	1.66	14	15	8.38
Morgan's Bridge	10.51	1.67	14	23	11.02	Windsor, Sav.-la-Mar	13.25	2.80	9	18	7.03
King's Valley	12.28	3.25	26	19	13.24	Sav.-la-Mar P.W.D.	8.42	1.10	30	19	7.13
Glasgow Estate	12.69	2.00	28	21	...	Retreat	9.73	1.75	14	17	7.56
King's Vale Police St.	12.23	2.10	7	28	...	White Hall	7.44	1.57	14	17	...
						Negril Point L. H.	10.04	1.94	9	10	...
Means	10.65	...	...	...	9.27	Means	5.34	...	...	...	5.29

## NOTES.

COMPARATIVE TABLE OF RAINFALL.  
(Based upon the "Average" Stations only.)

	AUGUST.	
	1908.	Average.
	In.	In.
North Eastern Division	6.63	7.62
Northern	5.40	4.35
West Central	10.65	9.27
Southern	5.84	5.29
The Island	7.00	6.63

The Rainfall over the Island for August, 1908, was the average: the forecast was therefore verified.

The greatest rainfall recorded was 21.31 in.: at Troy in the west central division and the lowest rainfall recorded was 0.57 in.: at Buff Bay in the southern division.

At George Town, Grand Cayman; the total rainfall for August, 1908, was 1.96 in.: 0.54 in.: fell on Aug. 29 and on 9 days rain fell.

## SHOCKS OF EARTHQUAKE DURING AUGUST, 1908.

Date	Mean time.		Intensity.	Notes: where felt, etc.
	Hr.	M.		
	hr.	min.		
1	5	0 a.m.	I	Falmouth.
3	1	20 "	I	Mt. Holstein; from S.
7	9	10 "	II	do. double shock with interval of $2\frac{1}{2}$ sec. from SE with sound at Kingston it was (I) from NE, felt also at Gordon Town, and Moy Hall.
25	8	0 p.m.	I	Mt. Holstein: prolonged
30	4	0 a.m.	I	Kingston: SE, 0.003.
31	10	40 p.m.	I	Siloah.

## 1908. Activity.

Jan.	..	82
Feb.	..	17
Mar.	..	11
April	..	9
May	..	3
June	..	6
July	..	0
Aug.	..	7

In W. R. No. 225 the corrections to the thermometers at the Negril Point Light house were given; after a lapse of ten years the corrections were taken again by means of the Jamaica Standard which has just been verified at Kew; they are here given; and it will be noticed that the changes are small.

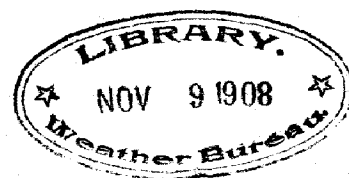
Dry bulb No. 75555	...	°0.5
Wet bulb " 75556	...	0.6
Max " 83746	...	0.5
Min. " 82501	...	0.4

It is proposed to allow for the changes in the reduction of Mr. Brownhill's valuable register; and to use his results to fill up the gap in the Jamaica records between the closing of the former Weather Service and the opening of the new.

MAXWELL, HALL Govt. Meteorologist.

Chapelton.

No. 357.



JAMAICA

# WEATHER REPORT

FOR THE MONTH OF

SEPTEMBER, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations are reduced to the standards of Kew, 32° gravity at Lat. 45°, and mean sea-level. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the lower clouds are for the most part fracto-stratus; the Middle clouds, cumulus; and the upper clouds, cirro-stratus.

STATIONS.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range	Max.	Date.	Min.	Date.	Range
	ft.	in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House .	8	29.886	29.843	81.8	84.9	87.5	79.1	8.4	91.6	16	73.7	*16	17.9
Kingston .	50	29.878	29.839	79.0	85.1	91.2	74.2	17.0	93.9	9	71.6	4	22.3
Negril Point Light House	33	29.867	29.844	79.6	84.2	88.6	73.3	15.3	90.1	6*	70.6	4	19.5
Castleton Gardens .	496	...	...	73.1	82.2	88.2	72.2	16.0	92.0	8	68.0	4*	24.0
Hope Gardens .	668	...	...	74.1	82.8	90.9	67.6	23.3	93.0	20	64.0	8*	29.0
Stony Hill Reformatory .	1,400	...	...	73.3	73.6	84.8	69.1	15.7	88	6*	67	5*	21
Hill Gardens .	4,907	...	...	63.6	67.1	72.3	59.4	12.9	75	1*	67	24	18.0

STATIONS.	Elevation.	Dew Point and Humidity.		Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)			Amount of Cloud, Lower, Middle and Upper.					
		7 a.m.	3 p.m.			7 a.m.	3 p.m.		7 a.m.			3 p.m.		
	ft.	°	°	in.	miles				L.	M.	U.	L.	M.	U.
Morant Pt. Light House .	8	78.6	90	80.1	86	4.00	239	E 8.4 E 9.6	1.8	2.2	1.9	1.6	2.2	2.2
Kingston .	50	70.2	75	72.7	67	0.64	139	N 2.8 SE 10.3	0.9	1.4	8.6	3.2	1.6	3.1
Negril Point Light House	33	72.9	79	72.8	70	3.00	262	NE 6.0 var. 10.5	0.8	0.5	4.6	2.9	4.6	0.7
Castleton Gardens .	496	71.3	93	74.6	79	17.70	...	...	...	...	...	...	...	...
Hope Gardens .	668	68.3	81	72.7	71	3.31	...	...	...	...	...	...	...	...
Stony Hill Reformatory .	1,400	70.2	90	74.0	86	10.64	...	...	...	...	...	...	...	...
Hill Gardens .	4,907	60.2	86	64.4	90	5.76	...	...	...	...	...	...	...	...

\* and on other days.

## RAINFALL FOR SEPTEMBER, 1908.

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The Northern division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central sub-division; the Southern division comprises the southern shores from Holland Bay to South Negril; the North Eastern and west Central divisions are the remaining parts of the Island bounded by the sea and the other divisions. Their relative areas are as follows:

North Eastern division	-	25
Northern and Central	-	22
West Central	-	26
Southern	-	27
		100

NORTH-EASTERN DIVISION.	SEPT., 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Manchioneal	3.34	1.80	29	11	11.54
Spring Valley	5.00	2.00	30	4	...
Bath	3.72	1.00	30	22	11.70
Boston	1.68	0.88	7	3	12.62
Moore Town	4.24	...	...	...	...
Port Antonio	5.05	2.25	20	11	10.58
Fellowship	5.67	1.07	16	15	15.10
Johnson River Bridge	4.83	2.93	30	11	...
Shrewsbury	2.65	0.80	20	10	...
Moy Hall, St. Thos.	4.27	2.74	30	13	...
Cedar Valley, St. Thos.	4.22	2.00	30	7	...
Hill Gardens	5.76	2.50	30	12	9.30
Buff Bay	4.85	1.85	16	10	5.64
Vinery	4.11	0.89	16	13	...
Windsor, Portland	4.52	2.44	16	8	...
Greenvale, Portland	6.51	1.50	27	17	...
Mt. Holstein	10.08	2.40	22	16	...
Hardware Gap	5.68	...	...	...	8.50
Stony Hill Reform.	10.64	4.20	30	19	9.88
Castleton Gardens	17.70	4.28	18	18	10.57
Lawrence Tavern	7.69	2.05	17	10	8.65
Water Valley	1.19	0.71	16	6	...
Agualta Vale	2.05	0.50	16	7	...
Albany Ry. Station	...	...	...	...	...
Richmond, St. Mary	4.28	1.80	17	10	4.41
Hampstead, St. Mary	7.19	1.70	3	14	...
Kendal, St. Mary	6.12	1.61	3	10	...
Gayle, P. W. D.	2.48	0.63	27	10	6.16
Rio Hoe	3.41	0.79	12	10	6.43
Moneague	7.52	2.66	15	11	7.48
Union Hill	7.52	4.13	15	9	...
Claremont	2.85	0.50	15	8	6.16
Albion, St. Ann	5.21	1.69	3	11	6.82
Averham Park	4.21	1.05	11	15	4.73
Ballintoy	6.31	4.11	3	10	7.10
Means	5.69	...	...	...	8.59

## NORTHERN DIVISION.

	SEPT., 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	4.68	1.52	12	12	9.64
Ocho Rios	2.35	0.70	15	4	...
Bogue, Ocho Rios	1.35	0.68	9	6	...
Drax Hall	4.08	2.12	15	6	3.82
Liberty Hill	3.35	1.83	15	8	...
St. Ann's Bay	4.41	2.10	15	7	2.95
Seville	5.10	2.02	15	14	3.37
Richmond Estate	2.50	0.52	15	9	4.11
Llandoverly	2.19	0.84	12	7	3.76
Southfield, St. Ann	3.35	0.72	8	11	...
Brown's Town	6.04	1.42	3	12	5.29
Hyde Park	4.05	2.50	3	5	...
Dry Harbour	3.85	1.50	23	8	...
Chewmagna, St. Ann	6.77	2.80	3	11	...
Home Castle	4.72	1.20	23	10	4.48
Richmond Pen	6.31	2.15	12	9	5.96
Mahogany Hall	8.79	2.75	17	13	6.22
Brampton Bryan	4.07	1.24	17	8	3.81
Bryan Castle	2.70	0.82	10	8	3.43
Braco	2.80	0.80	17	9	3.63
Aradlia	3.87	1.19	17	7	4.30
Harmony Hall	3.49	1.00	29	10	3.87
Vale Royal	4.10	0.74	3	9	5.11
Colchis Pen	10.85	2.55	19	6	5.11
Swanswick	4.75	0.90	15	11	...
Georgia	5.03	0.82	3	12	4.11
Long Pond	5.89	1.95	23	9	...
Hyde Hall	5.28	2.25	23	10	...
Steelfield	5.00	1.50	23	10	4.39
Etingdon	4.30	1.30	30	8	...
Oxford	4.20	1.30	30	10	4.08
Cambridge	5.60	1.40	23	7	4.68
Lottery	4.81	1.11	3	11	4.47
Falmouth P.W.D.	2.48	0.19	19	11	3.28
Florence Hall	2.22	0.68	9	8	...
Holland Pen	...	...	...	...	...
Kent	2.96	1.30	15	9	4.58
Canaan	12.41	3.32	17	10	8.06
Lima	7.95	2.40	15	9	...
Content	7.90	2.50	15	8	5.28
Bellfield	5.90	1.20	15	13	...
Hampden	7.58	1.45	15	5	...
Moor Park	5.04	1.75	17	9	...
Success	2.38	0.78	17	6	3.77
Cinnamon Hill	2.97	0.96	17	7	4.09
Rose Hall	3.35	0.90	15	7	3.88
Running Gut	4.80	2.33	15	7	4.11
Montego Bay	4.00	1.68	17	8	7.47
Fairfield, St. James	4.85	1.00	16	8	7.84
Round Hill	...	...	...	...	...
Sandy Bay	5.03	1.20	16	9	6.33
Lucea	5.41	1.68	17	16	6.63
Westfield	11.24	2.89	17	19	...

CENTRAL SUB-DIVISION	SEPT., 1908.					SOUTHERN DIVISION.	SEPT., 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.		In.			In.	
Headworks, Rio Cobre	4.42	1.42	9	14	5.89	Morant Point L. H.	4.00	1.28	30	14	7.64
Shanton	...	...	...	...	...	East Prospect	...	...	...	...	...
Linstead	2.54	0.74	30	8	7.63	Morant Bay	7.30	3.67	30	13	8.23
Berkshire Hall	4.43	1.50	17	12	...	Easington	4.05	1.42	30	12	8.11
Point Hill	6.02	1.94	2	7	11.19	Bull Bay	0.88	0.64	30	2	3.48
Carew Castle	9.91	1.80	4	13	...	Gordon Town	2.94	1.65	30	7	...
Worthy Park	...	...	...	...	...	Hope Gardens	3.31	1.06	30	14	6.54
Chapelton	5.77	2.20	25	11	7.27	King's House Garden	3.06	0.80	30	11	5.03
Mears	...	...	...	...	...	Half-way Tree	3.94	1.46	29	6	4.09
Danks Works	6.08	1.65	25	14	7.77	Lunatic Asylum	0.79	0.37	30	5	...
Savoy House	6.82	1.32	3	14	...	Kingston S. Camp Rd.	1.18	0.52	30	11	...
Crofts Hill	3.32	1.99	1	6	...	" P. W. Office	0.64	0.19	10	9	3.96
Cave Valley	3.07	1.25	10	6	7.45	Plumb Point L. H.	0.26	0.12	30	7	3.63
Means	4.89	...	...	...	5.13	Ballast Ground	1.86	0.65	30	6	...
WEST CENTRAL DIVISION						Spanish Town	1.30	0.69	30	4	4.90
Baillieston	2.93	1.00	18	16	...	Hog Hole Pen	4.14	2.23	15	9	6.84
Farm Plantation	...	...	...	...	...	Browns Hall	2.85	0.86	3	10	...
Brokenhurst	3.35	0.96	3	9	8.48	Old Harbour	1.30	0.67	8	4	5.50
Christiana	8.02	2.85	15	14	9.74	May Pen	3.55	1.50	2	6	6.51
Chudleigh	8.68	2.87	15	13	...	Hillside Estate	1.76	0.94	15	5	...
Shooter's Hill	1.86	0.78	3	8	...	Amity Hall	...	...	...	...	...
Spitzbergen	2.49	0.74	27	15	...	Money Musk	...	...	...	...	...
Kendal, Manchester	1.72	0.52	3	7	10.12	Dunkley's Vere	3.23	1.41	30	5	...
Marshall's Pen	3.41	1.52	27	7	8.43	Dry River	1.03	0.35	15	9	...
Mandeville, P.W.D.	3.54	1.22	30	15	9.76	Caswell Hill	...	...	...	...	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	...	...	...	...	...
Fairfield, Manchester	2.37	0.50	3	10	...	New Yarmouth	1.24	0.67	30	4	5.68
Ulster Spring	13.89	2.31	12	17	...	Exeter, Vere	1.70	0.90	28	7	...
Albert Town	9.22	2.31	22	13	...	Rhymesbury	3.05	1.37	30	6	...
Low River	5.83	2.00	10	13	...	Springfield, Clarendon	0.43	0.19	11	3	66.3
Troy	16.03	2.60	5	16	...	Milk River	1.74	0.90	18	6	...
Fontabelle, Trel.	5.45	1.10	3	13	11.44	Clarendon Pk. Ry. St.	1.21	0.50	2	5	...
Windsor Pen, Trel.	11.92	2.74	17	18	9.64	Victoria Town	3.55	2.22	30	...	6.66
Wallingford	9.40	3.05	25	14	...	Stone's Hope	2.11	1.25	26	6	7.94
Balaclava Pol. Sta.	9.40	3.12	25	14	9.64	Pratville	...	...	...	...	...
Siloah	13.28	1.80	19	18	...	Newport, Manchester	2.18	1.10	30	4	7.12
Appleton Estate	14.74	1.94	21	18	11.32	Great Valley, Man.	2.22	0.95	30	7	...
Maggotty	16.82	1.80	19	22	10.91	Alligator Pond	0.38	0.24	4	2	4.06
Ipswich Rly. St.	13.67	3.40	21	21	...	Pepper	2.13	0.75	9	9	8.09
Spring field, St. Eliz.	17.34	2.85	13	20	...	Long Hill	...	...	...	...	...
Caradupa Rly. Station	15.29	3.58	23	14	...	Unity, Malvern	...	...	...	...	...
Kempshot	9.74	1.79	17	20	10.09	Torrington	1.40	0.40	10	5	5.19
Kew Park	...	...	...	...	...	Bethlehem, St. Eliz.	4.40	3.35	2	9	...
Hazelymph	11.39	1.37	17	23	9.69	Santa Cruz	6.56	1.70	3	12	...
King Gate	5.08	1.36	17	9	...	Pedro Plains	1.14	0.48	27	4	...
Darliston	12.11	1.54	30	23	12.44	Black River	3.34	0.85	23	15	5.24
Whithorn	14.24	1.59	17	22	11.05	Spring Hill	...	...	...	...	...
Great Valley, Han.	9.75	2.90	17	13	12.41	Font Hill	4.40	1.00	1	9	4.84
Brownsville	10.43	3.03	23	19	...	Peters Ville	10.96	2.10	1	18	8.63
George's Plain	...	...	...	...	...	Mount Edgewcombe	12.60	2.84	24	17	7.86
Fontabelle, Westm.	...	...	...	...	...	Bluefields	...	...	...	...	...
Belleisle	9.99	1.96	17	14	10.82	Sweet River	5.43	0.96	17	17	7.37
Morgan's Bridge	12.50	2.86	17	24	9.86	Windsor, Sav.-la-Mar	5.90	1.35	9	18	7.11
King's Valley	14.60	2.85	17	19	12.82	Sav.-la-Mar P.W.D.	4.82	1.12	30	21	6.64
Glasgow Estate	13.69	2.65	17	20	...	Retreat	8.21	1.80	17	19	7.69
King's Vale Police St.	11.87	1.33	17	20	...	White Hall	3.13	0.50	20	13	...
Means	9.72	...	...	...	10.60	Negrit Point L. H.	3.00	0.80	20	12	...
						Means	3.69	...	...	...	6.28

**NOTES.**  
**COMPARATIVE TABLE OF RAINFALL.**  
*(Based upon the "Average" Stations only.)*

	SEPTEMBER.	
	1908.	Average.
	In.	In.
North Eastern Division	5.69	8.59
Northern	4.89	5.13
West Central	9.72	10.60
Southern	3.69	6.28
The Island	6.00	7.65

The Rainfall over the Island for September, 1908, was therefore about the average: and the forecast was therefore verified.

The greatest rainfall 17.70: was recorded at Castleton Gardens: and the smallest, 0.26, was recorded at the Plumb Point Light-house.

At George Town, Grand Cayman: 2.93 fell: the greatest was 1.43 on the 3rd: and rainfall on 10 days.

**SHOCKS OF EARTHQUAKE DURING SEPTEMBER, 1908.**

Date	Mean time.		Intensity.	Notes: where felt, etc.
	Hr.	M.		
14	hr. 5	min. 45 a.m.	I	Moy Hall, double shock: also felt as a single shock at Mt. Holstein: Port Antonio and Kingston.
"	8	16 "	II	Mt. Holstein, with sound. Also felt as I at Kingston; Green Vale, Portland; and Port Antonio.
26	9	0 p.m.	I	Crooked River, Upper Clarendon.
29	5	21 a.m.	II	Albion, St. Ann.

The second shock of Sept. 14th was recorded on the revolving drum of Mr. J. R. Scotland's seismometer at No. 5 South Camp Road, Kingston, as follows:—

	hr.	m.	sec.
First preliminary tremors	8	14	0 a.m.
Second "	"	"	2 "
Principal "	"	"	3 "
" " ended "	"	"	4 "
Tremors	"	"	6 "

A letter has been recently received from Mr. Ed. E. Melville of Great Valley, Hanover, enclosing a photo print of the tracing of a shock which occurred there at 3.30 p.m., Aug. 3rd. According to our usual notation it is registered as II, NE, 0.012, that is to say it was of No. II intensity, the motion was NE and SW, and the ground moved a little more than the hundredth of an inch.

There is a geological fault near Great Valley; it runs N and S at the Junction of the black shale and white lime stone; and as the shock was quite local, it most likely reached Great Valley from the fault a few miles to the S W. We may expect to have valuable records from Mr. Melville.

1908. Activity.

Jan.	..	32
Feb.	..	17
Mar.	..	11
April	..	9
May	..	3
June	..	6
July	..	0
Aug.	..	9
Sept.	..	6

**NEGRIL POINT LIGHT HOUSE.**  
 Results of ten year's observations by Mr. J. S. Brownhill.

Month.	Average highest			Temperatures.			Bar. Pressure.	
	Range.	Min.	Max.	Range.	Min.	Max.	7 a.m.	3 p.m.
January	23.3	63.5	86.8	14.9	68.9	83.8	29.990	29.934
February	24.7	63.9	86.8	15.3	68.4	83.7	29.996	29.940
March	22.7	63.9	86.8	15.2	68.9	84.1	29.981	29.925
April	20.7	66.3	87.0	13.9	70.8	84.7	29.949	29.904
May	19.5	68.9	88.4	12.9	72.9	85.8	29.924	29.877
June	20.1	70.3	89.2	12.5	78.7	86.2	29.932	29.881
July	21.6	70.0	90.1	14.3	73.0	87.3	29.969	29.921
August	20.1	68.4	90.0	14.2	73.0	87.2	29.904	29.858
September	20.1	70.3	90.4	14.0	73.4	87.4	29.869	29.822
October	19.2	70.0	89.2	13.1	73.3	86.4	29.910	29.854
November	22.5	66.6	89.1	14.3	71.8	86.1	29.963	29.904
December	22.7	65.9	88.5	14.5	70.4	84.9	29.941	29.894
Means	21.4	67.3	88.7	14.1	71.5	85.6	29.941	29.894

The highest temperature recorded was 92°.5 on the 19th September, 1906.  
The lowest temperature recorded was 60°.7 on the 31st January and 2nd February, 1907.

Month.	Dewpoint and Humid.		Rainfall. Inches.	Miles of Wind per diem.	Wind; from : and Miles per hour.		Cloud.
	7 a.m.	3 p.m.			7 a.m.	3 p.m.	
January	66.7	69.6	1.64	265	NE	ENE	4.5
February	66.6	69.7	1.62	243	NE	NE	4.1
March	67.7	69.7	2.59	240	NE	E	3.5
April	69.6	70.9	3.18	245	NE	E	4.2
May	72.0	73.2	5.96	229	ENE	ESE	5.0
June	72.5	74.4	7.14	235	E	SE	6.0
July	71.9	74.3	5.38	195	ENE	ESE	7.2
August	73.3	74.5	6.58	196	ENE	ESE	5.1
September	73.2	74.5	7.76	199	ENE	E	5.3
October	73.2	73.8	7.76	232	ENE	ENE	5.7
November	71.0	72.2	2.98	224	NE	NE	6.0
December	68.2	70.5	2.54	250	NE	ENE	4.5
Mean	70.4	72.3	53.76	229	NE by E	E	5.0
							7.5

The bar. pressure and mean temperature is almost the same as at Kingston; but the daily max. is somewhat lower and the daily min. is somewhat higher than at Kingston; and this also applies to the other max. and min.

As at Kingston the daily min. falls to the temperature of the dew-point, when further fall is arrested by the deposition of dew. Thus the mean dew-point is 71°.1; and the mean min. 71°.5; the mean humidity being 80.

The winds are very interesting; we see that the diurnal variation is strongly marked, and the direction veers between 7 a.m. and 3 p.m. by often as much as 4 points of the compass; that is to say if the wind is from the ENE in the morning, it is often from the ESE in the afternoon. Again there is an annual variation; during the winter months the winds are

NE and ENE in the morning and evening respectively, while during the summer months they are ENE and ESE respectively.

This annual change is of the nature of a "monsoon;" in the summer time the temperature in the United States rises very high, and draws in the wind from the Gulf of Mexico, from the S or SE and from the Caribbean Sea from the SE.

These diurnal and annual variations have been continually observed at the Kempshot Observatory, but registration there has never been continued long enough to establish these important points; and Mr. Brownhill is to be congratulated.

The miles of wind per diem is unusually large, due to the fact that the anemometer is mounted on a pole above the top of the lantern of the lighthouse, which is of course an unusually fine exposure.

In Weather Report No. 275, p. 9. it was pointed out that the mean max. temperature in Kingston from year to year closely followed the sun-spot curve; and it was hoped that when the former Weather Service was closed April 1st, 1899, that the observations at Negril which commenced in 1897 would enable us to follow the curve. Consequently great care has been taken with the corrections to the thermometers; and in the above tables allowance has been made for the change in the corrections; and the following are the results for the Negril Point Light-house:—

Year.	Mean Maxima.	Smoothed.	Solar phase.
1898	85.8	85.8	
1899	85.5	85.7	
1900	85.7	85.6	
1901	85.7	85.7	Min.
1902	85.7	85.8	
1903	86.1	85.7	
1904	85.2	85.6	
1905	85.6	85.3	Max.
1906	85.1	85.5	
1907	85.9		
Mean	85.6		

It will be noticed that while the temp. is highest at the time of the Solar min. and lowest at the time of the Solar max., yet the change is so small that it is only one-fourth of the change observed in Kingston.

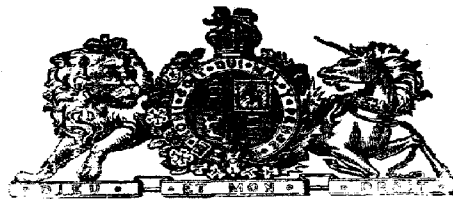
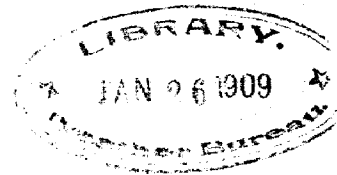
The Kingston observations have been resumed; and these at Negril at least show that the connection between the phenomena holds good so that there is not an absolute break in the series.

MAXWELL, HALL Govt. Meteorologist.

Chapelton.

Sept. 19th, 1905.

No. 358.



JAMAICA

# WEATHER REPORT

FOR THE MONTH OF

OCTOBER, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations are reduced to the standards of Kew, 32°, gravity at Lat. 45°, and mean sea-level. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus: the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATIONS.	Eleva- tion.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range	Max.	Date.	Min.	Date.	Range
	ft.	in.	in.	"	"	"	"	"	"		"		"
Morant Pt. Light House .	8	29.881	29.825	78.2	82.1	84.9	73.6	11.3	87.8	5	68.5	21	19.3
Kingston	50	29.872	29.822	75.0	81.9	87.5	72.3	15.2	90.8	13	69.6	21	21.2
Negril Point Light House	33	29.870	29.815	77.7	82.8	85.	72.6	13.2	89.8	15	68.0	14	21.8
Castleton Gardens .	496	...	...	73.1	79.5	86.4	70.7	15.7	89	*3	66	27	*23
Hope Gardens .	688	...	...	72.0	80.6	88.4	64.6	23.8	93	4	62	20	*31
Stony Hill Reformatory .	1,400	...	...	70.9	78.4	82.6	67.7	14.9	86	14	65	14	21
Hill Gardens .	4,907	...	...	61.1	63.9	68.5	57.9	10.9	73	*1	55	21	18

STATIONS.	Eleva- tion.	Dew Point and Hu- midity.				Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
		7 a.m.		3 p.m.				7 a.m.		3 p.m.		7 a.m.			3 p.m.		
	ft.	°		°		in.	miles	m.		m.		L.	M.	U.	L.	M.	U.
Morant Pt. Light House .	8	75.7	92	78.9	88	15.79	191	Var.	6.2	Var.	8.2	2.2	2.1	1.7	2.7	2.0	1.7
Kingston .	50	70.2	86	73.0	75	4.72	128	NNE	3.4	SE	8.8	2.7	1.4	0.6	2.8	3.1	1.6
Negril Point Light House	33	72.2	83	73.3	73	13.67	270	ESE	4.6	SE	10.5	8.5	0.8	1.6	4.5	3.0	0.4
Castleton Gardens .	496	69.9	90	74.9	84	11.54	...	...	...	...	...	...	...	...	...	...	...
Hope Gardens .	668	67.8	87	73.3	76	4.46	...	...	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory .	1,400	69.7	96	74.7	88	4.07	...	...	...	...	...	...	...	...	...	...	...
Hill Gardens .	4,907	57.7	89	62.0	93	9.01	...	...	...	...	...	...	...	...	...	...	...

\* and on other days.



# RAINFALL FOR OCTOBER, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each division. These results are reproduced in the comparative table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four divisions.

The Northern division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central subdivision; the Southern division comprises the southern shores from Holland Bay to South Negrit; the North Eastern and west Central divisions are the remaining parts of the Island bounded by the sea and the other divisions. Their relative areas are as follows:

North Eastern division	-	25
Northern and Central	-	22
West Central	-	26
Southern	-	27
		100

OCT., 1908.						RICHMOND PEN							
NORTH-EASTERN DIVISION.	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell	Average.	Mahogany Hall		Barnstaple		Brampton Bryan			
		Amount.	Date.			Bryan Castle		Braco		Arcadia		Harmony Hall	
								Colchis Pen		Swanswick		Georgia	
	In.	In.			In.								
Manchioneal	19.66	7.60	17	21	24.28								
Spring Valley	18.89	5.30	17	18	...								
Bath	25.35	10.20	17	25	23.23								
Boston	6.64	1.80	17	3	13.56								
Moore Town	14.43	5.50	12	5	...								
Port Antonio	13.41	3.52	16	11	15.01								
Fellowship	15.56	2.15	15	18	19.75								
Johnson River Bridge	20.72	2.90	17	25	...								
Shrewsbury	13.41	1.90	18	20	...								
Moy Hall, St. Thos.	13.84	2.62	17	27	...								
Cedar Valley, St. Thos.	13.12	4.00	19	25	...								
Hill Gardens	9.01	1.93	4	21	19.44								
Buff Bay	10.09	2.38	18	14	12.33								
Vinery	8.71	2.89	18	16	...								
Windsor, Portland	8.63	1.25	5	13	...								
Greenvale, Portland	7.52	1.30	17	20	...								
Mt. Holstein	7.75	1.01	16	25	...								
Hardware Gap	...	...	...	...	...								
Stony Hill Reform.	4.07	1.06	10	16	14.94								
Castleton Gardens	11.54	3.00	31	19	16.06								
Lawrence Tavern	...	...	...	...	...								
Water Valley	4.85	1.34	19	8	...								
Agualta Vale	4.26	0.90	22	10	...								
Albany Ry. Station	4.02	1.60	18	9	...								
Richmond, St. Mary	7.94	1.95	18	13	12.05								
Hampstead, St. Mary.	6.39	2.10	17	20	...								
Kendal, St. Mary	8.84	2.09	3	14	...								
Gayle, P. W. D	4.37	1.00	2	16	11.58								
Rio Hoe	8.13	1.67	31	17	10.34								
Moneague	9.06	1.50	11	23	12.43								
Union Hill	10.72	2.18	21	15	...								
Claremont	9.68	1.80	1	13	...								
Albion, St. Ann	12.63	1.85	3	19	9.02								
Averham Park	10.77	2.23	31	15	9.82								
Ballintoy	9.17	2.78	3	16	...								
Means	11.54	...	...	...	15.02								
</													

## NORTHERN DIVISION.

OCT., 1908.

NORTHERN DIVISION.	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	7.37	1.18	6	15	9.21
Ocho Rios	...	...	...	...	...
Bogue, Ocho Rios	5.86	1.30	2	11	...
Drax Hall	7.62	2.70	3	10	7.66
Liberty Hill	6.45	1.55	31	14	...
St. Ann's Bay	6.67	1.13	18	15	9.23
Seville	4.79	0.70	19	19	7.15
Richmond Estate	8.72	1.75	2	16	8.26
Llandoverly	10.91	3.88	4	17	8.10
Southfield, St. Ann	7.70	1.42	4	17	...
Brown's Town	9.67	1.46	31	19	10.78
Hyde Park	12.10	2.90	9	10	...
Dry Harbour	7.30	1.25	30	10	...
Chewmagna, St. Ann	8.04	1.77	21	15	...
Home Castle	12.60	3.10	24	15	7.27
Richmond Pen	8.04	1.79	10	9	7.84
Mahogany Hall	13.63	2.06	30	22	7.61
Barnstaple	15.05	2.50	24	17	...
Brampton Bryan	9.43	2.40	30	17	4.85
Bryan Castle	11.60	2.32	31	19	5.44
Braco	11.85	1.55	5	21	5.36
Arcafia	14.24	2.35	30	15	6.27
Harmony Hall	12.34	1.41	5	19	5.35
Vale Royal	21.95	2.70	26	21	6.65
Colchis Pen	18.33	3.60	2	13	8.42
Swanswick	16.80	2.30	30	21	...
Georgia	15.43	2.00	26	22	6.32
Long Pond	13.27	1.55	2	21	...
Hyde Hall	12.28	1.57	30	24	...
Steelfield	11.54	2.00	26	22	6.12
Etingdon	11.09	2.05	31	21	...
Oxford	13.85	1.35	23	24	7.44
Cambridge	13.60	2.35	30	21	6.71
Lottery	10.46	1.61	5	23	6.57
Falmouth P.W.D.	8.86	1.24	2	19	5.96
Florence Hall	8.99	1.93	2	22	...
Holland Pen	...	...	...	...	...
Kent	9.30	1.90	31	14	6.93
Canaan	16.77	3.06	2	15	...
Lima	13.15	3.00	31	11	...
Content	13.62	3.45	31	15	6.08
Bellfield	8.49	1.41	31	21	...
Hampden	...	...	...	...	...
Moor Park	14.00	3.35	30	19	...
Succcess	15.60	5.30	31	16	6.27
Cinnamon Hill	15.81	5.70	31	16	6.57
Rose Hall	17.15	5.70	31	16	5.76
Running Gut	15.58	5.79	31	16	5.07
Montego Bay	20.00	3.75	30	20	8.17
Fairfield, St. James	18.60	6.00	31	16	7.49
Round Hill	9.20	...	...	...	...
Sandy Bay	10.29	4.22	31	10	10.51
Lucea	13.14	2.18	31	17	9.59
Westfield	15.15	3.32	16	25	...

CENTRAL SUB-DIVISION	Oct., 1908.					SOUTHERN DIVISION.	Oct., 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.		In.			In.	
Headworks, Rio Cobre	7.11	1.75	5	20	10.62	Morant Point L. H.	15.79	3.95	17	24	11.60
Shanton	...	...	...	...	...	East Prospect	15.47	6.28	18	23	...
Linstead	7.57	1.69	12	17	11.03	Morant Bay	22.65	9.24	17	21	18.04
Berkshire Hall	6.04	1.25	20	18	...	Easington	13.58	2.86	17	22	18.37
Point Hill	12.68	2.69	11	15	...	Bull Bay	...	...	...	...	...
Carew Castle	8.11	1.50	21	15	...	Gordon Town	...	...	...	...	...
Worthy Park	...	...	...	...	...	Hope Gardens	4.46	0.78	17	17	11.75
Chapelton	7.60	1.45	5	23	18.00	King's House Garden	3.95	1.10	5	14	11.09
Mears	9.86	1.40	6	16	...	Half-way Tree	...	...	...	...	...
Danks Works	7.75	1.30	5	21	...	Lunatic Asylum	4.29	1.15	8	15	...
Savoy House	7.84	1.04	6	24	...	Kingston S. Camp Rd.	4.42	0.78	9	15	...
Crofts Hill	7.96	1.44	10	22	...	" P. W. Office	4.72	0.95	5	15	8.34
Cave Valley	9.02	1.95	12	13	10.13	Plumb Point L. H.	5.95	1.00	6	15	8.27
Means	11.89	...	...	...	7.76	Ballast Ground	...	...	...	...	...
WEST CENTRAL DIVISION						Spanish Town	7.83	1.88	5	13	10.02
Baillieston	...	...	...	...	...	Hog Hole Pen	7.65	1.72	20	14	10.48
Farm Plantation	...	...	...	...	...	Browns Hall	11.50	2.44	6	15	...
Brokenhurst	...	...	...	...	...	Old Harbour	12.49	2.90	18	10	11.80
Christiana	8.31	1.30	9	22	14.86	May Pen	11.46	2.39	15	16	15.04
Chudleigh	11.31	2.73	3	15	...	Hillside Estate	17.97	7.88	9	19	...
Shooter's Hill	11.89	4.49	10	23	...	Amity Hall	...	...	...	...	...
Spitzbergen	8.53	1.41	9	22	...	Money Musk	...	...	...	...	...
Kendal, Manchester	12.74	4.20	10	21	18.83	Dunkley's, Vere	15.67	5.11	9	20	...
Marshall's Pen	9.74	2.00	9	16	12.89	Dry River	16.19	5.97	9	20	...
Mandeville, P.W.D.	10.22	2.11	9	23	18.05	Caswell Hill "	...	...	...	...	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	12.76	2.40	9	13	10.75
Fairfield, Manchester	9.33	2.24	4	21	...	New Yarmouth	12.33	5.14	9	16	13.82
Ulster Spring	8.57	1.63	4	13	10.44	Exeter, Vere	13.64	4.05	9	18	...
Albert Town	11.35	3.03	2	12	...	Rhymesbury	14.48	3.05	9	20	...
Low River	11.79	1.58	20	20	...	Springfield, Clarendon	10.82	3.98	9	11	9.07
Troy	14.77	2.50	3	18	16.68	Milk River	10.35	5.00	9	12	...
Fontabelle, Trel.	12.95	2.10	4	23	11.35	Clarendon Pk. Ry. St.	...	...	...	...	...
Windsor Pen, Trel.	14.97	1.90	4	21	9.02	Victoria Town	12.29	3.33	9	14	13.56
Wallingford	6.54	1.58	3	15	...	Stone's Hope	9.11	1.60	9	16	14.89
Balaclava Pol. Sta.	7.15	2.31	3	16	15.64	Pratville	...	...	...	...	...
Siloah	7.81	1.15	3	17	...	Newport, Manchester	11.98	1.87	29	14	15.84
Appleton Estate	5.33	0.80	3	21	12.85	Great Valley, Man.	8.46	1.91	16	19	...
Maggotty	9.52	1.72	3	20	16.36	Alligator Pond	6.75	1.25	6	11	10.90
Ipswich Rly. St.	...	...	...	...	...	Pepper	7.05	1.30	28	18	13.45
Springfield, St. Eliz.	8.15	1.60	14	20	...	Long Hill	...	...	...	...	...
Catadupa Rly. Station	7.70	1.74	6	16	...	Unity, Malvern	...	...	...	...	...
Kempshot	14.69	3.00	2	22	9.78	Torrington	4.29	1.00	10	8	14.04
Kew Park	9.37	2.35	5	20	...	Bethlehem, St. Eliz.	7.38	2.20	2	16	...
Hazelymph*	12.92	3.00	3	19	10.57	Santa Cruz	7.67	1.20	20	18	11.78
King Gate	15.18	3.15	30	21	...	Pedro Plains	3.17	0.92	16	8	...
Darliston	10.94	1.74	6	22	15.43	Black River	4.73	0.96	6	20	9.03
Whithorn	8.51	1.15	6	26	14.19	Spring Hill, St. Eliz.	...	...	...	...	...
Great Valley, Han.	21.30	4.40	31	14	12.10	Font Hill	4.90	1.80	6	11	12.66
Brownsville	22.15	5.03	31	18	...	Peters Ville	4.79	1.41	6	13	...
George's Plain	...	...	...	...	...	Mount Edgewcombe	3.53	1.03	2	12	10.82
Fontabelle, Westm.	13.92	2.06	21	21	9.81	Bluefields	6.40	1.88	13	12	...
Belleisle	14.11	2.41	21	19	8.47	Sweet River	7.03	1.40	13	13	10.09
Morgan's Bridge	12.33	2.55	21	23	15.30	Windsor, Sav.-la-Mar	5.91	1.95	1	19	8.29
King's Valley	14.92	3.00	30	18	13.36	Sav.-la-Mar P.W.D.	4.50	1.13	6	21	9.99
Glasgow Estate	21.45	7.12	31	26	...	Retreat	12.56	2.17	16	19	13.46
King's Vale Police St.	18.99	4.16	30	22	...	White Hall	10.52	2.25	17	16	...
Means	11.90	...	...	...	13.30	Negril Point L. H.	13.67	3.75	16	13	...
						Means	8.88	...	...	...	12.04

\* Gauge overflowed on the 3rd.

**NOTES.**  
**COMPARATIVE TABLE OF RAINFALL.**  
*(Based upon the "Average" Stations only.)*

	OCTOBER	
	1908.	Average.
	In.	In.
North Eastern Division	11.54	15.62
Northern	11.89	7.76
West Central	11.90	13.30
Southern	8.88	12.04
The Island	11.05	12.03

The Rainfall over the Island for October, was therefore an inch below the average.

The greatest rainfall 25.35, was recorded at Bath; and the smallest, 3.17, was recorded at Pedro Plains.

On the 31st flood rains threatened the estates in St. James on the northern shore, as much as 4 inches falling in less than 2 hours.

At George Town, Grand Cayman, 14.16 fell on 21 days; the greatest fall was 2.39 on the 20th.

**SHOCKS OF EARTHQUAKE DURING OCTOBER, 1908.**

Date	Mean time.		Intensity.	Notes: where felt, etc.
	hr.	min.		
7	3	a.m.	I	Mt. Holstein.
12	4	35 "	I	do. prolonged: sound
15	12	4 "	I	do. and Kingston
19	2	0 p.m.	I	Kings Valley, West.
26	5	30 "	I	Mt. Holstein; N. O. 007

The shock of Oct. 15th was recorded on the revolving drum of Mr. J. R. Scotland's seismometer at No. 5 South Camp Road, Kingston, as follows:—

	hr.	m.	sec.
First preliminary tremors	12	4	0 a.m.
Second "	"	"	3 "
Principal "	"	"	5 "
Tremors ended	"	"	7 "

We are glad to get the first record from the seismometer at Mount Holstein. Mr. A. Benn has reported from time to time that the shocks generally come from the S or S.E.; that is to say from Catherine Peak or Silver Hill Gap; and this was so on Oct. 26.

**Earthquake Activity 1908.**

Jan.	...	32
Feb.	...	17
Mar.	...	11
April	...	9
May	...	3
June	...	6
July	...	0
Aug.	...	9
Sept.	...	6
Oct.	...	5

**THE DIURNAL VARIATION OF THE RAINFALL AT KINGSTON, JAMAICA.**

The U. S. Meteorological Station in Kingston is provided with a self-registering rain gauge which measures the amount of rain fallen at intervals of time, so that the Diurnal variation will be very accurately known in the course of a few years.

But as the Diurnal variation is now required for certain physical problems, it occurred to me that by reducing the notes made by Mr. Robert Johnstone, in the large Kingston registers between 1881 and 1896 inclusive a close approximation would be obtained.

The registers give the amount of rain fallen during any day, and the notes give the time at which the rain fell, or its duration if prolonged; and their reduction was made under my supervision by Mr. L. Maxwell Hall.

The mode of reduction was to ascertain the total amount of rain recorded for each hour for each month; and then various groups were formed to show that the characteristics were consistent throughout the whole series, and not dependent on seasons, or any particular year or years.

The following table gives the amount of rainfall for the 16 years for each hour for spring and summer, or from March to August inclusive; for autumn and winter, or from September to February inclusive; and for the whole year. The last column gives the percentage for each hour for the whole series.

TABLE SHOWING THE DIURNAL VARIATION OF THE RAINFALL.

Hour.	Spring and Summer.	Autumn and Winter.	Whole Year.	
	in.	in.	in.	per cent.
1 a.m.	6.85	4.85	11.70	2.3
2 "	10.63	8.05	18.68	3.6
3 "	9.32	8.62	17.94	3.5
4 "	8.74	8.22	16.96	3.3
5 "	8.94	7.65	16.59	3.3
6 "	10.53	8.00	18.53	3.6
7 "	12.53	11.27	23.80	4.7
8 "	12.92	11.03	23.95	4.7
9 "	10.89	10.54	21.43	4.2
10 "	10.09	8.63	18.72	3.6
11 "	9.95	7.31	17.26	3.2
Noon	11.61	11.30	22.91	4.5
1 p.m.	16.09	13.68	29.77	5.8
2 "	18.55	16.52	35.07	6.8
3 "	24.57	18.63	43.20	8.5
4 "	26.60	17.20	43.80	8.6
5 "	18.83	12.50	31.33	6.1
6 "	13.12	10.49	23.61	4.6
7 "	11.05	7.95	19.00	3.7
8 "	8.28	6.33	14.61	2.8
9 "	6.41	5.38	11.79	2.3
10 "	6.04	4.42	10.46	2.1
11 "	5.55	6.19	11.74	2.3
Midnt.	5.84	3.82	9.66	1.9
Sums	283.73	228.58	512.31	100.0

From this table we see that the rainfall is least at midnight that it increases more or less regularly to 3 and 4 p.m., that there is a very small max. at 2 and 3 a.m.; another small max. at 7 and 8 a.m. and then the large max. at 3 and 4 p.m.; after which it decreases more or less regularly to the min. at midnight.

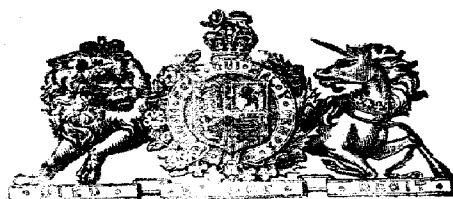
These characteristics permeate the whole series; month after month, year after year, the same features are more or less strongly marked; and they are also reproduced by the self-registering rain gauge for the spring and summer of the present year.

It is therefore quite clear that we are dealing with important physical phenomena, though their explanation may be hard to find.

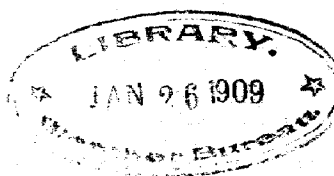
MAXWELL HALL, Govt. Meteorologist.

Chapelton.

No. 359.



JAMAICA



# WEATHER REPORT

FOR THE MONTH OF

NOVEMBER, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations are reduced to the standards of Kew, 32°, gravity at Lat. 45°, and mean sea-level. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus: the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATIONS.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range	Max.	Date.	Min.	Date.	Range
		in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	29.943	29.885	79.0	81.0	83.5	75.7	7.8	83.9	4	69.8	25	13.9
Kingston	50	29.927	29.871	73.4	82.4	88.4	71.0	17.4	91.7	27	66.7	30	25.0
Negril Point Light House	33	29.969	29.882	75.3	82.8	86.7	71.5	15.2	92.2	11	68.0	23	24.2
Castleton Gardens	496	...	...	69.8	79.9	85.1	69.3	15.8	90.0	10	65.0	9*	25.0
Hope Gardens	668	29.926	29.869	70.0	79.6	89.4	63.5	15.9	90.0	*10	60.0	*15	30.0
Stony Hill Reformatory	1,400	...	...	69.0	77.7	89.0	65.9	17.0	89.0	11	65.0	3*	24.0
Hill Gardens	4,907	25.246	25.209	59.8	63.1	67.7	56.5	11.2	73.0	11	54.0	28	19.0

STATIONS.	Eleva- tion.	Dew Point and Hu- midity.				Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
		7 a.m.		3 p.m.				7 a.m.		3 p.m.		7 a.m.			3 p.m.		
		°	°	°	°			in.	miles	°	m.	°	m.	L.	M.	U.	L.
Morant Pt. Light House .	8	76.5	91	77.6	89	11.50	261	NE	10.0	NE	9.5	1.9	2.4	1.4	1.3	2.3	2.1
Kingston .	50	67.1	81	70.5	67	1.54	116	N	4.2	SSE	6.7	1.1	2.3	0.5	4.8	1.8	0.2
Negril Point Light House	33	69.9	82	71.3	69	3.86	232	NE	3.6	ENE	6.3	2.3	0.5	1.5	2.8	3.3	1.5
Castleton Gardens .	496	64.4	81	74.5	82	9.92	...	...	...	...	...	...	...	...	...	...	...
Hope Gardens .	668	66.1	87	73.5	79	2.14	...	...	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory .	1,400	66.4	91	73.3	86	5.60	...	...	...	...	...	...	...	...	...	...	...
Hill Gardens .	4,907	56.2	84	60.8	93	6.91	...	...	...	...	...	...	...	...	...	...	...

\* and on other days.

## RAINFALL FOR NOVEMBER, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each division. These results are reproduced in the comparative table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four divisions.

The Northern division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central subdivision; the Southern division comprises the southern shores from Holland Bay to South Negril; the North-Eastern and west Central divisions are the remaining parts of the Island bounded by the sea and the other divisions. Their relative areas are as follows:—

North-Eastern division	—	—	25
Northern and Central	—	—	22
West Central	—	—	26
Southern	—	—	27

100

NORTH-EASTERN DIVISION.	Nov., 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Manchioneal	14.15	7.10	6	21	13.24
Spring Valley	16.55	3.35	7	12	...
Bath	14.00	4.40	4	23	13.51
Boston	11.19	4.10	6	7	12.86
Moore Town	14.74	...	...	...	...
Port Antonio	23.96	4.94	6	18	14.63
Fellowship	25.05	5.65	21	23	14.53
Johnson River Bridge	4.59	1.71	4	16	...
Shrewsbury	13.33	1.75	1	25	...
Moy Hall, St. Thos.	6.29	1.33	4	19	...
Cedar Valley, St. Thos.	9.12	3.10	4	14	...
Hill Gardens	6.91	1.18	28	22	12.41
Buff Bay	10.81	1.75	6	19	14.64
Vinery	10.62	1.66	1	17	...
Windsor, Portland	9.18	2.20	6	18	...
Greenvale, Portland	16.24	4.82	18	25	...
Mt. Holstein	12.11	2.00	19	24	...
Hardware Gap	5.30	...	...	...	10.36
Stony Hill Reform.	5.00	1.55	2	17	6.72
Castleton Gardens	8.82	3.36	20	17	11.77
Lawrence Tavern	3.02	0.50	19	11	6.93
Water Valley	6.40	1.10	27	17	...
Agualta Vale	7.97	2.10	20	21	...
Albany Ry. Station	...	...	...	...	...
Richmond, St. Mary	4.58	1.30	30	19	12.22
Hampstead, St. Mary	11.08	4.70	19	26	...
Kendal, St. Mary	4.59	1.10	10	8	...
Gayle, P. W. D	7.32	1.37	20	22	12.10
Bio Hoe	5.38	0.90	29	15	8.79
Moneague	4.90	0.80	28	20	4.44
Union Hill	3.68	0.40	26	12	...
Claremont	3.95	1.05	12	10	9.65
Aibion, St. Ann	4.78	0.74	29	22	9.32
Averham Park	7.95	1.84	28	16	10.27
Ballintoy	...	...	...	...	...
Means	10.81	...	...	...	9.39

Nov., 1908.

## NORTHERN DIVISION.

	Total Fall.	Greatest fall in 24 hours		Days on which 0.01 or more fell.	Average.
		Amount.	Date.		
	In.	In.			In.
Port Maria	16.61	2.00	6	24	9.84
Ocho Rios	7.62	1.56	29	19	...
Bogae, Ocho Rios	8.83	1.51	29	17	...
Drax Hall	9.12	1.70	6	10	9.94
Liberty Hill	9.28	1.95	19	16	...
St. Ann's Bay	9.50	1.70	29	14	10.60
Seville	9.68	1.60	4	13	9.69
Richmond Estate	...	...	...	...	...
Llandoverly	7.69	1.10	4	13	9.10
Southfield, St. Ann	9.55	1.94	19	11	...
Brown's Town	10.51	2.64	29	16	10.36
Hyde Park	6.70	1.60	28	8	6.53
Dry Harbour	8.55	3.00	2	9	...
Chawmagna, St. Ann	3.09	0.62	3	11	...
Home Castle	8.00	2.20	5	11	7.20
Richmond Pen	5.35	1.15	2	9	4.39
Mahogany Hall	6.59	1.75	4	11	5.99
Barnstaple	6.75	1.80	4	9	...
Brampton Bryan	6.33	1.42	6	12	5.38
Bryan Castle	5.07	1.55	30	9	6.08
Braco	5.30	1.15	19	11	5.99
Arcadia	6.28	1.75	19	8	6.54
Harmony Hall	4.93	1.04	5	13	5.64
Vale Royal	6.20	1.63	27	8	7.21
Colohis Pen	5.80	3.10	4	7	4.97
Swanswick	7.75	2.65	5	12	...
Georgia	4.97	1.30	20	9	5.78
Long Pond	5.10	1.60	5	10	...
Hyde Hall	4.99	2.05	5	10	...
Steelfield	3.89	1.06	5	10	5.95
Etingdon	3.87	1.30	5	9	...
Oxford	7.00	2.82	5	13	5.70
Cambridge	6.30	2.80	5	9	5.83
Lottery	5.20	1.90	5	7	5.29
Falmouth P.W.D.	4.31	0.79	4	16	5.00
Florence Hall	3.26	0.90	19	13	...
Holland Pen	3.95	1.20	20	8	...
Kent	3.79	1.50	19	8	4.98
Canaan	4.78	1.70	5	8	4.21
Lima	5.00	...	...	...	...
Content	4.89	1.47	5	8	4.25
Bellfield	2.78	0.75	19	10	...
Hampden	...	...	...	...	...
Moor Park	2.54	0.73	4	13	...
Success	4.70	1.50	19	8	...
Cinnamon Hill	4.22	1.60	19	8	4.76
Rose Hall	4.57	2.00	19	8	...
Running Gut	4.70	1.50	19	9	...
Montego Bay	3.99	1.29	30	10	4.41
Fairfield, St. James	1.80	1.00	5	5	...
Round Hill	...	...	...	...	...
Sandy Bay	6.41	3.71	4	6	5.29
Lucea	2.61	0.85	4	12	6.15
Westfield	3.51	1.59	7	7	...

CENTRAL SUB-DIVISION.	Nov., 1908.					SOUTHERN DIVISION.	Nov., 1908.				
	Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.
		Amount.	Date.					Amount.	Date.		
	In.	In.			In.		In.	In.			In.
Headworks, Rio Cobre	6.25	1.84	16	14	4.30	Morant Point L. H.	11.50	2.56	19	20	6.03
Shanton	...	...	...	...	...	East Prospect	11.03	4.19	4	17	...
Linstead	1.50	0.35	15	6	5.59	Morant Bay	5.50	2.77	4	14	6.57
Berkshire Hall	1.91	0.40	30	13	...	Easington	4.80	4.10	4	6	6.22
Point Hill	13.36	3.42	20	14	6.05	Bull Bay	0.86	0.5	4	3	2.70
Carew Castle	3.75	1.20	2	10	...	Gordon Town	2.13	0.70	24	8	7.04
Worthy Park	1.39	0.67	3	5	3.67	Hope Gardens	2.14	0.50	4	16	5.67
Chapelton	5.08	0.95	6	10	4.13	King's House Garden	2.58	0.70	27	12	3.31
Mears	4.52	1.90	20	10	...	Half-way Tree	1.09	1.09	...	1	3.54
Danks Works	6.15	1.85	20	17	...	Lunatic Asylum	1.54	1.00	4	8	...
Savoy House	6.18	1.75	1	16	...	Kingston S. Camp Rd.	1.64	1.13	4	9	...
Crofts Hill	4.85	1.41	1	10	...	" P. W. Office	1.54	0.68	4	9	2.66
Cave Valley	2.15	0.70	4	9	4.71	Plumb Point L. H.	1.44	0.79	4	6	2.23
Means	5.71	...	...	...	5.65	Ballast Ground	2.71	1.04	4	4	...
WEST CENTRAL DIVISION.						Spanish Town	2.04	0.70	15	7	3.02
Baillieston	4.45	2.00	20	9	...	Hog Hole Pen	4.21	2.4	20	9	3.68
Farm Plantation	...	...	...	...	...	Browns Hall	6.88	2.19	4	10	...
Brokenhurst	...	...	...	...	...	Old Harbour	2.35	1.11	8	3	2.57
Christiana	3.55	1.10	20	11	6.28	May Pen	6.70	2.45	6	10	3.85
Chudleigh	5.40	2.93	20	8	...	Hillside Estate	5.81	2.94	7	7	...
Shooter's Hill	4.82	1.76	18	13	...	Amity Hall	...	...	...	...	...
Spitzbergen	7.38	1.83	3	15	...	Money Musk	...	...	...	...	...
Kendal, Manchester	5.20	2.72	18	8	6.97	Dunkley's Vere	5.01	2.06	7	7	...
Marshall's Pen	5.05	2.10	18	9	5.10	Dry River	...	...	...	...	...
Mandeville, P.W.D.	4.39	1.24	7	16	6.37	Caswell Hill	...	...	...	...	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	5.35	1.80	6	9	4.76
Fairfield, Manchester	4.87	2.65	20	14	...	New Yarmouth	5.58	2.78	7	6	1.68
Ulster Spring	5.59	1.92	4	10	5.54	Exeter, Vere	4.83	2.10	6	6	...
Albert Town	6.29	1.43	6	8	...	Rhymesbury	4.41	1.40	7	9	...
Low River	2.92	0.80	20	10	...	Springfield, Clarendon	5.31	1.70	6	7	...
Troy	5.13	1.55	21	8	5.28	Milk River	5.04	2.00	8	4	...
Fontabelle, Trel.	6.80	3.90	5	9	6.02	Clarendon Pk. Ry. St.	2.70	1.20	7	7	...
Windsor Pen, Trel.	6.09	3.52	5	11	5.41	Victoria Town	4.54	1.64	7	6	3.21
Wallingford	9.51	2.27	3	13	...	Stone's Hope	1.94	0.41	7	7	5.38
Balaclava Pol. Sta.	7.12	1.12	3	15	6.11	Pratville	...	...	...	...	...
Siloah	7.05	1.85	20	11	...	Newport, Manchester	5.49	1.86	7	8	7.25
Appleton Estate	7.55	1.49	20	14	5.28	Great Valley, Man.	2.18	0.45	24	10	...
Maggotty	6.76	2.33	2	12	6.38	Alligator Pond	2.05	0.57	24	7	3.83
Ipswich Rly. St.	7.29	1.20	18	13	...	Pepper	6.40	1.75	20	12	5.01
Springfield, St. Eliz.	8.19	2.47	18	12	...	Long Hill	...	...	...	...	...
Catadupa Rly. Station	5.11	2.03	4	7	...	Unity, Malvern	...	...	...	...	...
Kempshot	3.58	0.78	4	9	6.82	Torrington	6.36	1.50	12	14	7.19
Kew Park	4.64	1.57	2	11	5.49	Bethlehem, St. Eliz.	5.93	1.10	21	19	...
Hazelymph	2.87	0.55	6	8	4.87	Santa Cruz	6.55	1.65	15	12	5.59
King Gate	5.02	1.67	5	10	...	Pedro Plains	6.81	1.30	1	12	...
Darliston	8.95	3.21	2	15	7.12	Black River	2.89	1.10	21	12	4.73
Whithorn	5.81	1.65	2	15	6.33	Spring Hill, St. Eliz.	...	...	...	...	...
Great Valley, Han.	4.12	1.65	4	9	5.79	Font Hill	3.70	1.15	15	11	6.58
Brownsville	3.80	1.40	4	10	...	Peters Ville	6.55	1.50	2	12	8.02
George's Plain	...	...	...	...	...	Mount Edgcombe	4.70	1.29	1	10	5.27
Fontabelle, Westm.	...	...	...	...	...	Bluefields	9.96	2.62	5	10	...
Belleisle	0.79	0.29	6	6	3.56	Sweet River	1.35	0.40	6	8	3.87
Morgan's Bridge	6.02	2.16	14	10	5.95	Windsor, Sav.-la-Mar	1.39	0.77	30	9	3.83
King's Valley	...	...	...	...	...	Sav.-la-Mar, P.W.D.	...	...	...	...	...
Glasgow Estate	4.57	1.35	21	9	...	Retreat	5.05	1.62	7	9	5.93
King's Vale Police St.	6.43	2.20	4	13	...	White Hall	2.86	1.11	4	7	...
						Negril Point L. H.	3.86	2.06	4	6	...
Means	5.29	...	...	...	5.85	Means	4.29	...	...	...	4.71

**NOTES.**  
**COMPARATIVE TABLE OF RAINFALL.**  
*(Based upon the "Average" Stations only.)*

	NOVEMBER.	
	1908.	Average.
	In.	In.
North Eastern Division	10.81	9.89
Northern	5.71	5.65
West Central	5.29	5.85
Southern	4.29	4.71
 The Island	 6.52	 6.40

The Rainfall over the Island for November, was therefore the average.

The greatest rainfall 25.35, was recorded at Bath; and the smallest, 3.17, was recorded at Pedro Plains.

At George Town, Grand Cayman, 3.58 fell on 10 days; the greatest fall was 1.48 on the 17th.

**SHOCKS OF EARTHQUAKE DURING NOVEMBER, 1908.**

Date	Mean time.	Intensity.	Notes: where felt, etc.
	hr. min.		
3	1 0 p.m.	I	Mt. Holstein.
6	10 16 "	II	do. sound Felt as I at Kingston and Moy Hall
21	1 0 a.m.	I	N and S, South Camp Road.

Mr. J. R. Scotland has now completed his seismograph at South Camp Road, and from the length of the N and S and E and W vibrations it appears that the shock on the 6th came from N 37° E, or from near Silver Hill Gap, as usual.

At Mt. Holstein the seismometer recorded motion both N and S, and E and W; the former combines with the direction found by Mr. Scotland and determines the position of the epicentre.

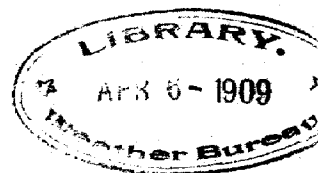
From a rough drawing of the tracing sent me by Mr. Benn of the slight shock on the 3rd at Mt. Holstein, it would appear that the shock was chiefly N and S, but that some E and W motion was again recorded. I suspect that the wires holding the index are somewhat slack.

**Earthquake Activity 1908.**

Jan.	...	32
Feb.	...	17
Mar.	...	11
April	...	9
May	...	3
June	...	6
July	...	0
Aug.	...	9
Sept.	...	6
Oct.	...	5
Nov.	...	4

MAXWELL HALL, Govt. Meteorologist.

No. 360.



JAMAICA

# WEATHER REPORT

FOR THE MONTH OF

DECEMBER, 1908.

## METEOROLOGICAL RESULTS.

The Bar-pressures at all the Stations are reduced to the standards of Kew, 32°, gravity at Lat. 45°, and mean sea-level. Thermometers are exposed in Stevenson's Screens; their readings have been corrected for instrumental errors.

The miles of Wind per diem are measured by Robinson's Anemometers, the factor 3 being assumed correct for the small instruments used and for the small velocities measured.

The amount of Cloud is given in tenths of the whole sky; the Lower clouds are for the most part fracto-stratus; the Middle clouds, cumulus; and the Upper clouds, cirro-stratus.

STATIONS.	Elevation.	Bar. Pressure.		Temperature.					Extreme Temperature.				
		7 a.m.	3 p.m.	7 a.m.	3 p.m.	Max.	Min.	Range	Max.	Date.	Min.	Date.	Range
	ft.	in.	in.	°	°	°	°	°	°		°		°
Morant Pt. Light House	8	29.966	29.992	78.1	79.8	81.9	76.0	5.9	88.5	*3	67.5	*14	14.5
Kingston	50	29.947	29.892	71.0	83.0	87.6	68.6	19.0	91.4	1	64.7	10	26.7
Negril Point Light House	33	29.966	29.894	73.4	83.3	85.8	69.0	16.8	89.1	21	66.0	10	23.1
Castleton Gardens	496	...	...	86.1	77.5	81.6	67.6	14.0	85.0	*4	61.0	*20	24.0
Hope Gardens	668	29.937	29.895	66.2	81.2	87.7	59.9	27.8	89.0	*1	55	10	34.0
Stony Hill Reformatory	1,400	...	...	67.7	77.0	80.3	65.0	15.3	85.0	1	63.0	19	22.0
Hill Gardens	4,907	25.239	25.216	58.8	61.9	66.1	54.5	11.6	70.0	22	52.0	17	18.0

STATIONS.	Elevation.	Dew Point and Humidity.				Rainfall.	Wind per diem.	Wind: (direction from and miles per hour.)				Amount of Cloud. Lower, Middle and Upper.					
		7 a.m.		3 p.m.				7 a.m.		3 p.m.		7 a.m.			3 p.m.		
		°	°	in.	miles			N	m.	N	m.	L.	M.	U.	L.	M.	U.
Morant Pt. Light House .	8	75.1	88	76.3	89	3.51	...	NE	11.1	E	10.4	1.9	2.2	1.5	1.6	2.0	1.4
Kingston .	50	64.0	79	67.6	60	4.83	119	N	4.1	S	6.9	1.0	1.0	1.0	1.7	2.0	0.7
Negril Point Light House	33	66.4	78	68.2	61	2.37	2.45	NE	5.8	NE	6.3	1.0	1.5	2.1	1.3	2.9	0.6
Castleton Gardens .	496	64.5	88	74.9	91	25.72	...	...	...	...	...	...	...	...	...	...	...
Hope Gardens .	668	61.3	84	67.4	62	7.19	...	...	...	...	...	...	...	...	...	...	...
Stony Hill Reformatory .	1,400	65.2	91	72.6	86	7.05	...	...	...	...	...	...	...	...	...	...	...
Hill Gardens .	4,907	54.6	89	59.0	93	14.21	...	...	...	...	...	...	...	...	...	...	...

\* and on other days.



## RAINFALL FOR DECEMBER, 1908.

The first four columns contain all the information relating to the Rainfall for the month received for publication up to the date of this report; the last column contains the corresponding Rainfall average for the month, according to Weather Report, No. 256A. In obtaining the mean Rainfall for the month from the numbers in the column for the total fall, only those Stations are considered for which the average Rainfall has been also given in the last column, so that the results of these two columns are directly comparable for each division. These results are reproduced in the comparative table at the end of this Rainfall Return, so as to arrive at the mean for the whole Island, embracing the four divisions.

The Northern division comprises the northern shores from Port Maria to Davis' Cove, including the central part of the Island which forms the Central subdivision; the Southern division comprises the southern shores from Holland Bay to South (Negril); the North-Eastern and west Central divisions are the remaining parts of the Island bounded by the sea and the other divisions. Their relative areas are as follows:

North-Eastern division	-	-	25
Northern and Central	-	-	22
West Central	-	-	26
Southern	-	-	27
			100

		Dec., 1908.										
		Total Fall.	Greatest fall in 24 hours.		Days on which 0.01 or more fell.	Average.						
			Amount.	Date.								
NORTH-EASTERN DIVISION.		In.	In.			In.						
Manchioneal	10.35	4.40	31	10	9.51		Richmond Pen	4.46	1.10	30	7	5.21
Spring Valley	15.36	4.00	31	9	...		Mahogany Hall	5.44	1.52	30	13	6.15
Bath	10.25	1.32	29	18	8.96		Barnstable	5.30	1.50	30	11	...
Boston	8.40	3.50	31	6	11.03		Brampton Bryan	4.83	1.71	30	12	5.76
Moore Town	19.70	10.70	31	4	...		Bryan Castle	5.19	1.50	30	12	6.28
Port Antonio	33.06	14.26	30	25	13.91		Braco	3.88	1.30	30	12	6.09
Fellowship	45.69	23.64	30	21	18.42		Arcadia	3.52	1.70	30	4	6.86
Johnson River Bridge	9.75	4.79	31	8	...		Harmony Hall	3.62	1.30	30	8	6.43
Shrewsbury	23.17	4.92	31	18	...		Vale Royal	4.30	1.23	1	10	8.13
Moy Hall, St. Thos.	11.15	4.85	30	15	...		Colchis Pen	3.12	1.20	26	9	4.74
Cedar Valley, St. Thos.	13.98	4.80	30	10	5.62		Swanswick	3.80	1.40	30	10	...
Hill Gardens	14.21	2.62	30	17	11.17		Georgia	3.64	1.12	30	9	...
Buff Bay	11.48	2.35	31	19	13.68		Long Pond	4.27	1.30	30	12	...
Vinery	14.03	1.70	1	21	...		Hyde Hall	3.67	1.00	12	9	...
Windsor, Portland	7.28	1.80	30	17	...		Steelfield	3.78	1.20	30	12	...
Greenvale, Portland	38.49	8.80	27	24	...		Etingdon	2.80	0.85	1	8	...
Mt. Holstein	26.15	5.59	27	24	...		Oxford	3.69	0.94	30	12	6.97
Hardware Gap	8.25	...	...	...	7.38		Cambridge	4.30	1.30	13	7	6.84
Stony Hill Reform.	7.05	1.95	31	14	4.31		Lottery	3.33	1.40	30	7	5.96
Castleton Gardens	25.72	7.50	28	16	12.43		Falmouth P.W.D.	3.61	0.94	30	11	5.40
Lawrence Tavern	5.74	1.35	31	10	4.06		Florence Hall	4.29	1.16	30	12	...
Water Valley	5.09	1.21	31	17	...		Holland Pen	6.07	1.65	30	9	5.06
Agualta Vale	9.89	1.30	26	7	...		Kent	4.85	1.85	30	10	...
Albany Ry. Station	4.87	1.80	13	9	...		Canaan	6.72	2.26	30	13	5.27
Richmond, St. Mary	10.57	2.55	1	19	10.08		Lima	7.65	...	...	...	...
Hampstead, St. Mary	12.11	1.92	13	19	...		Content	6.98	3.15	30	13	...
Kendal, St. Mary	14.00	7.00	29	9	...		Bellfield	4.69	1.81	3	18	...
Gayle, P. W. D.	9.01	1.90	31	18	11.71		Hampden	...	...	...	...	...
Rio Hoe	11.86	3.65	1	15	9.76		Moor Park	5.96	2.10	10	12	...
Moneague	11.66	4.75	1	21	8.06		Success	4.70	1.90	30	11	4.26
Union Hill	8.25	1.59	12	12	...		Cinnamon Hill	4.81	1.87	30	10	5.61
Claremont	8.86	2.00	16	12	10.48		Rose Hall	6.00	1.85	30	12	5.53
Albion, St. Ann	9.06	1.59	1	20	8.44		Running Gut	6.55	2.55	30	11	5.96
Averham Park	9.44	2.00	30	14	11.29		Montego Bay	6.29	1.67	30	11	5.25
Ballintoy	5.83	1.23	30	15	5.53		Fairfield, St. James	4.45	1.30	30	8	4.64
Unity Valley	10.37	3.50	1	21	...		Round Hill	9.00	2.00	30	7	3.25
Means	13.52	...	...	...	9.78		Sandy Bay	5.87	2.85	30	6	3.72
							Lucea	2.53	0.88	30	11	4.27
							Westfield	4.37	2.12	30	8	...

CENTRAL SUB-DIVISION.	DEC., 1908.					SOUTHERN DIVISION.	DEC., 1908.				
	Total Fall.	Greatest fall in 24 hours.			Average.		Total Fall.	Greatest fall in 24 hours.			Average.
		Amount.	Date.	Days on which 0.01 or more fell.				Amount.	Date.	Days on which 0.01 or more fell.	
Headworks, Rio Cobre	3.85	1.54	30	10	1.97	Morant Point L. H.	3.57	0.76	31	14	6.41
Shanton	...	...	...	...	...	East Prospect	7.28	2.47	31	12	...
Linstead	4.44	1.40	30	2	3.76	Morant Bay	6.73	3.58	31	11	3.86
Berkshire Hall	4.71	0.80	29	17	...	Easington	6.23	3.00	31	18	3.11
Point Hill	8.53	4.73	30	10	4.52	Bull Bay	5.61	2.9	31	5	1.12
Carew Castle	7.55	2.00	31	13	...	Gordon Town	5.19	2.05	31	8	3.32
Worthy Park	5.23	2.46	30	9	2.48	Hope Gardens	7.19	3.25	31	12	2.64
Chapelton	4.23	2.34	30	6	2.30	King's House Garden	5.99	2.80	31	13	1.90
Mears	3.18	1.1	31	5	...	Half-way Tree	4.07	2.50	31	3	2.01
Danks Works	4.10	2.65	30	6	2.04	Lunatic Asylum	...	...	...	...	...
Savoy House	4.22	2.68	30	6	...	Kingston S. Camp Rd	5.30	3.22	31	4	...
Crofts Hill	4.09	2.33	30	7	...	" P. W. Office	4.83	3.62	31	6	1.78
Cave Valley	3.30	2.03	30	9	2.74	Plumb Point L. H.	5.19	4.1	31	6	1.61
Means	4.97	...	...	...	2.82	Ballast Ground	4.72	2.93	31	5	...
WEST CENTRAL DIVISION						Spanish Town	3.47	2.01	30	6	2.03
Baillieston	...	...	...	...	...	Hog Hole Pen	5.02	2.07	30	6	3.01
Farm Plantation	...	...	...	...	...	Browns Hall	5.91	3.08	30	9	...
Brokenhurst	7.31	6.10	31	5	4.09	Old Harbour	4.37	3.00	30	4	2.57
Christiana	6.72	3.80	30	9	4.50	May Pen	4.32	2.45	30	5	1.90
Chudleigh	8.02	3.71	30	7	...	Hillside Estate	7.40	5.25	30	2	...
Shooter's Hill	5.59	3.00	30	8	...	Amity Hall	...	...	...	...	...
Spitzbergen	8.07	3.78	30	11	...	Money Musk	...	...	...	...	...
Kendal, Manchester	5.52	3.75	30	6	2.70	Dunkley's, Vere	6.17	5.20	30	3	...
Marshall's Pen	6.44	4.50	30	7	3.51	Dry River	6.92	5.56	30	4	...
Mandeville, P.W.D.	6.69	4.59	30	11	3.45	Caswell Hill "	...	...	...	...	...
Carlton, Mandeville	...	...	...	...	...	Denbigh	4.60	3.60	31	3	2.09
Fairfield, Manchester	7.62	5.12	30	9	...	New Yarmouth	6.56	5.27	30	3	1.89
Ulster Spring	4.12	1.15	28	5	4.93	Exeter, Vere	5.50	4.65	30	3	...
Albert Town	3.20	1.05	30	8	...	Rhymesbury	6.70	5.04	30	3	...
Low River	5.01	3.40	30	6	...	Springfield, Clarendon	5.60	2.70	30	8	2.98
Troy	6.36	2.75	31	6	4.18	Milk River	5.80	4.40	30	3	...
Fontabelle, Trel.	5.80	2.10	13	12	5.72	Clarendon Pk. Ry. St.	4.74	3.20	30	3	...
Windsor Pen, Trel.	3.41	1.50	30	10	5.47	Victoria Town	8.25	6.85	30	3	2.67
Wallingford	3.98	2.76	30	8	...	Stone's Hope	6.32	4.90	30	3	2.82
Balaclava Pol. Sta.	3.56	2.55	30	7	2.80	Pratville	...	...	...	...	...
Siloah	5.08	2.65	30	6	...	Newport, Manchester	7.53	5.00	30	5	4.14
Appleton Estate	...	...	...	...	...	Great Valley, Man.	6.47	4.15	30	4	...
Maggotty	3.17	2.35	30	6	3.07	Alligator Pond	5.53	5.09	30	3	2.76
Ipswich Rly. St.	2.00	1.40	30	6	...	Pepper	7.80	5.00	31	7	2.94
Springfield, St. Eliz.	5.89	3.51	31	2	...	Long Hill	...	...	...	...	...
Catadupa Rly. Station	4.71	2.60	30	5	...	Unity, Malvern	...	...	...	...	...
Kempshot	6.18	1.24	10	18	5.11	Torrington	4.85	3.85	30	6	2.71
Kew Park	1.88	1.06	30	7	2.75	Bethlehem, St. Eliz.	7.98	3.73	30	11	...
Hazelympb	2.60	1.80	30	5	2.48	Santa Cruz	5.38	2.50	30	7	2.85
King Gate	4.22	1.52	30	10	...	Pedro Plains	3.86	1.20	30	8	...
Darliston	4.79	2.23	30	7	3.22	Black River	3.65	1.61	30	8	2.46
Whithorn	1.47	0.80	30	7	2.93	Spring Hill, St. Eliz.	...	...	...	...	...
Great Valley, Han.	5.45	2.00	30	10	5.51	Font Hill	2.75	1.40	31	6	8.54
Brownsville	5.10	1.68	30	10	...	Peters Ville	5.19	0.83	15	10	2.56
George's Plain	...	...	...	...	...	Mount Edgecombe	4.65	1.65	30	10	2.43
Fontabelle, Westm.	1.80	1.73	30	2	3.05	Bluefields	2.45	0.96	31	5	...
Belleisle	2.58	2.18	30	7	2.95	Sweet River	2.94	1.22	30	4	2.61
Morgan's Bridge	3.13	2.15	30	7	2.66	Windsor, Sav.-la-Mar	3.85	1.75	13	6	2.36
King's Valley	4.16	2.40	30	9	3.37	Sav.-la-Mar, P.W.D.	3.01	1.05	12	5	2.43
Glasgow Estate	2.83	0.80	30	5	...	Retreat	2.19	1.14	30	4	1.88
King's Vale Police St.	3.36	2.18	30	9	...	White Hall	1.20	0.50	29	5	...
Means	4.44	...	...	...	3.81	Negri Point L. H.	2.37	1.58	30	5	...
						Means	5.10	...	...	...	2.82

\* Rain gauge overflowed on 31st.

## NOTES.

## COMPARATIVE TABLE OF RAINFALL.

(Based upon the "Average" Stations only.)

	DECEMBER.	
	1908.	Average.
	In.	In.
North Eastern Division	13.52	9.78
Northern	4.97	2.82
West Central	4.44	3.81
Southern	5.10	2.82
The Island	7.01	4.81

The Rainfall over the Island for December, was therefore 2 inches above the average.

The greatest rainfall 45.69, was recorded at Fellowship; and the smallest, 1.47, was recorded at Whithorn.

At George Town, Grand Cayman, 2.74 fell on 5 days; the greatest fall was 2.50 on the 31st.

## SHOCKS OF EARTHQUAKE DURING DECEMBER, 1908.

Date	Mean time.	Intensity.	Notes: where felt, etc.
21	3 a.m.	I	Mt. Holstein: motion E and W.
24	3 "	I	Mt. Holstein: motion E and W; some sound.
28	...	...	The horizontal pendulums at Chapelton moved to the earthquake in Costa Rica on this day, so that there is no indication that they were affected by the great earthquake in southern Italy the same day; these pendulums seem very sensitive to earthquakes in Costa Rica.

## Earthquake Activity 1908.

Jan.	...	32
Feb.	...	17
Mar.	...	11
April	...	9
May	...	3
June	...	6
July	...	0
Aug.	...	9
Sept.	...	6
Oct.	...	5
Nov.	...	3
Dec.	...	2

## THE JAMAICA RAINFALL OVER THE ISLAND.

From about 110 "average" Stations.

1908.	Rainfall Divisions.				The Island.
	NE	N	WC	S	
	In.	In.	In.	In.	In.
January	7.53	6.03	2.98	1.98	4.38
February	7.57	6.64	3.56	2.42	5.05
March	5.39	1.86	3.31	3.14	3.42
April	3.33	1.73	5.81	2.91	3.45
May	3.40	3.20	9.48	3.61	4.92
June	14.12	10.78	11.27	10.42	11.65
July	4.03	1.77	7.90	3.00	4.17
August	6.63	5.40	10.65	5.34	7.00
September	5.69	4.89	9.72	3.69	6.00
October	11.54	11.89	11.9	8.88	11.05
November	10.81	5.71	5.29	4.29	6.52
December	13.52	4.97	4.44	5.10	7.01
Total	93.56	63.87	86.29	54.78	74.62

## PHYSICAL OCCURRENCES DURING 1908.

On January 2nd there was a No. IV shock of earthquake felt generally as a No. III all over the Island which caused a good deal of alarm: its epicentre was badly defined, but lay in the middle of the west-central rainfall division.

The May rains were very small, but heavy rains fell in June due to a passing barometric depression; and generally speaking, the rainfall this year was about the average, but was insufficient to replenish the springs and rivers after the great drought of 1907.

There were three major cyclones and one minor cyclone this year; the first was a terrible cyclone which swept the Turks Islands on the 10th and 11th Sept. and subsequently passed over the Bahamas. Of this the people of Grand Turks Island had warning from the Weather Bureau at Washington.

The next cyclone passed south of Porto Rico and San Domingo, and threatened Jamaica on the 26th Sept., but fortunately for us it turned WNW and went over Haiti and the Bahama Islands again. Of this cyclone we had good warning from Washington, but of course the change in the course was noticed here before the announcement was received from Washington.

While this cyclone was devastating Port-au-Prince, a minor cyclone appeared S E of Jamaica: it passed Morant Point Light-house about mid-day of the 24th Sept., on a N W course: the wind blew a gale at Kemphot causing anxiety as to how Jamaica had fared: it nearly wrecked a Cayman schooner south of Cape Cruz; and from information received from Havana it was felt as far north as Cienfuegos in Cuba, where it died out. Local warning was given in Jamaica of this secondary cyclone: but in the minds of the public it got mixed up with the primary cyclone and caused unnecessary alarm.

The third large cyclone appeared off the northern coast of Panama on the 14th Oct. and swept Costa Rica; of this cyclone we had no information from Washington; but luckily it went into the Gulf of Mexico instead of recurring upon Jamaica as it might have done.

Our experience this year points to the advisability of improving the warning of the local Weather Service.

max + min + 7a + 3p = 2.0 + 4

Kingston, Jamaica. Mean results for the year 1908. Elevation 50 feet.

Month.	Bar. Pressure.		Temperatures.						Extremes for the month.			Dewpoint and humidity		Rain-fall.	Miles of wind per diem.	Wind: from and miles per hour.		Clouds, in tenths.						Weather remarks, &c.					
	7 a.m.	3 p.m.	Mean	7 a.m.	3 p.m.	Max.	Min.	Range.	Max.	Min.	Range.	7 a.m.	3 p.m.			7 a.m.	3 p.m.	Lower.	Middle.	Upper.									
January	Ins.	29.973	29.936	75.9	70.0	81.2	86.2	68.1	18.1	90.4	65.2	25.2	63.5	80	68.6	66	0.92	125.3	N	5.0	Var.	9.5	3.5	0.0	0.0	5.5	0.5	0.0	Rain on nine days, remainder cloudy or fair.
February	30.002	29.960	75.8	69.9	81.2	86.4	67.9	18.5	89.1	64.6	24.5	63.7	81	69.2	67	1.29	150.6	N	4.0	SE	10.5	1.2	1.5	0.0	3.2	2.4	0.3	Rain on five days, remainder cloudy or fair.	
March	29.992	29.952	77.2	71.8	83.4	87.1	68.3	18.8	91.8	63.3	28.5	65.5	81	72.5	70	1.27	156.6	N	4.3	SE	10.9	0.4	1.0	1.0	3.5	2.9	0.4	Rain on nine days, light "norther" on 4th and 5th.	
April	29.977	29.931	78.2	75.9	82.2	87.0	69.8	17.2	89.4	66.8	22.6	66.0	72	70.5	68	0.30	166.7	N	2.9	SE	12.2	0.7	1.1	0.2	4.1	3.2	0.2	Rain on three days, cloudy or fair for the remainder.	
May	29.957	29.908	80.9	79.6	84.3	88.7	73.0	15.7	92.1	70.0	22.1	67.8	67	70.0	62	1.61	203.1	N	3.7	SE	15.2	0.3	1.1	2.1	2.3	1.7	2.6	Fine early part of month, cloudy towards latter part. Four rainy days.	
June	29.964	29.927	80.1	77.8	83.9	87.8	72.8	15.0	91.6	68.5	23.1	69.5	76	72.1	68	6.93	209.2	N	4.6	SE	16.4	1.5	0.7	3.2	1.0	2.0	3.7	Heavy showers of rain early part of the month, continuous sea breeze 14th to 20th.	
July	29.981	29.947	81.0	77.5	85.3	90.0	73.2	16.8	92.9	69.9	23.0	69.7	77	71.7	64	0.95	169.5	N	3.6	SE	14.3	0.5	1.0	2.0	0.7	2.4	3.5	Light rains the first half of month, S E squalls on 4th and 7th.	
August	29.952	29.927	81.5	78.8	84.5	90.7	74.1	16.6	93.1	71.9	21.2	68.3	70	73.5	70	1.41	161.8	N	3.8	SE	12.0	0.4	0.9	2.0	3.2	1.8	2.8	Nine rainy days. Light thunderstorms on 9th, 13th, 20th and 23rd. Squalls 17th, 27th, 28th, and 30th.	
September	29.878	29.839	81.9	79.0	85.1	91.2	74.2	17.0	93.9	71.6	22.3	70.2	75	72.7	67	0.64	138.7	N	2.8	SE	10.3	0.9	0.5	3.6	3.2	1.6	3.1	Nine rainy days, distant lightning on many nights. Passing cyclone on 29th.	
October	29.872	29.822	78.7	75.0	81.9	87.5	72.3	15.2	90.8	69.6	21.2	70.2	85	73.0	75	4.72	121.5	NN E	3.4	SE	8.8	2.7	1.4	0.6	2.8	3.1	1.6	Fifteen rainy days. Fine on six days. Light thunderstorms on 5th and 19th.	
November	29.927	29.871	78.4	73.4	82.4	88.4	71.0	17.4	91.7	66.7	25.0	67.1	81	70.5	67	1.54	116.0	N	4.2	SSE	6.7	1.1	2.3	0.5	4.8	1.8	0.2	Nine rainy day. Fine on ten days. Light thunderstorm on 4th, 5th and 20th.	
December	29.947	29.892	77.1	71.0	83.0	87.6	68.6	19.0	91.4	64.7	26.7	64.0	79	67.6	60	4.83	119.0	N	4.1	S	6.9	1.0	1.0	1.0	1.7	2.0	0.7	Six rainy days. Passing depression about 30th, causing heavy rain.	
Total																													
Means	29.952	29.909	78.9	75.0	83.2	88.2	71.1	17.1	91.5	67.7	23.8	67.1	77	71.0	67	26.41	153.8	N	3.9	SE	11.1	1.2	1.0	1.0	1.3	3.0	2.1	1.6	Fair. Rainfall deficient.

MAXWELL HALL, Govt. Meteorologist.